Washington State Child Care Career and Wage Ladder (CWL)

Post CWL Evaluation Report

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TABLE OF CONTENTS

Section **Page**

Section **Page**

LISTING OF CHARTS AND TABLES

LISTING OF CHARTS AND TABLES CONTINUED

LISTING OF CHARTS AND TABLES CONTINUED

Washington State Child Care Career and Wage Ladder Pilot Project
Post-Career and Wage Ladder Evaluation: A Follow-up Study
Executive Summary

Studies completed by the Washington Department of Social and Health Services (DSHS) have demonstrated low wages and high turnover rate for Washington child care staff (Miller and Schrager, 2000; Schrager and Roswell, 2005). However DSHS has also noted that the education and retention of child care workers is linked to the quality of child care. Paying child care workers higher wages, based on their experience and education would be an incentive for these workers to remain in their jobs longer and obtain more education, thus improving the quality of child care (DSHS RFQ, Research and Evaluation Component, Washington State Child Care Career and Wage Ladder Pilot Project, January 5, 2000, Exhibit B).

Addressing these assumptions and data, in 1999 Washington State Governor Gary Locke provided four million dollars, from the Temporary Assistance to Needy Families (TANF) reinvestment funds, to support the Washington State Child Care Career and Wage Ladder Pilot Project (duration of Pilot July 2000-June 2001). In the summer of 2001, the Governor allocated additional TANF funds to extend the Pilot through June of 2003 (thus the Pilot duration was three years).

The Pilot Project was a collaboration between a sub-group of licensed child care centers in Washington and DSHS. DSHS developed a career and wage ladder establishing specific job titles and related wages based on teacher education and experience. Participating centers agreed to adopt this career ladder. Teacher wages were raised to a base level, and raises given over the life of the project based on job title, educational attainment, and length of employ. The state appropriation paid for teacher wage increments based on educational milestones completed. Participating child care centers paid for teacher wage increments based on time in position and provided specified staff benefits. The state also paid for part of the time in position increments for those centers enrolling more than 25% of their children with tuition subsidized by DSHS. In addition, the state paid a 15% administrative fee to participating centers.

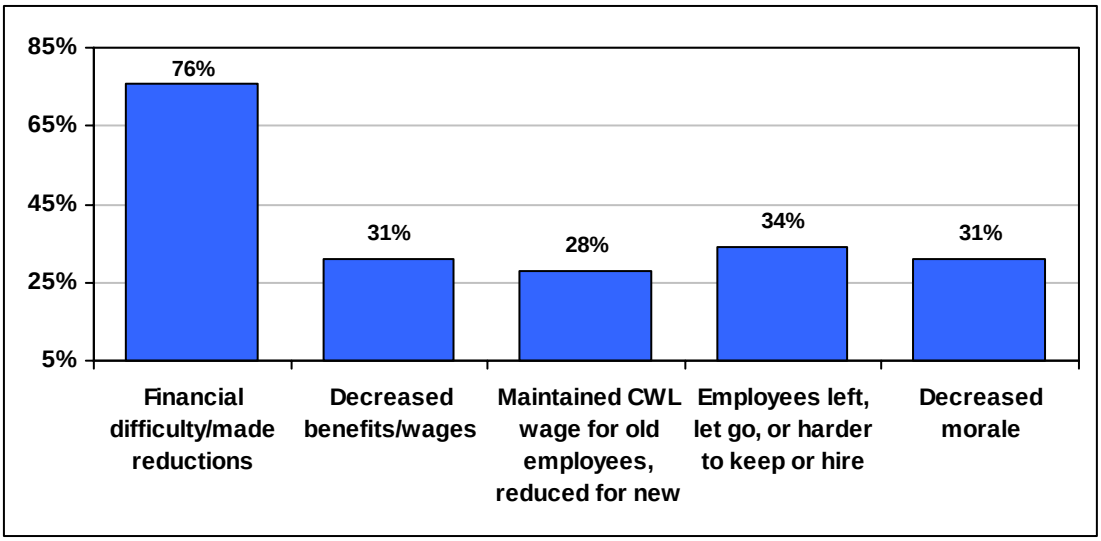
DSHS contracted with researchers from Washington State University (WSU) to conduct a three year long evaluation study which examined the effects of this intervention on employee wages and benefits, educational attainment and pursuit, retention and morale, as well as the effect on quality of care in the classroom. In general, the evaluation revealed that centers that had participated in the pilot project had employees with higher wages and education, who received more benefits, had higher morale and provided better quality of care. Whereas pilot center employees tended to stay with centers longer, their overall yearly (or three year) retention rates were not better, except for a small percentage of employees hired at the very beginning of the pilot project (see Boyd and Wandschneider, 2004 for the report of these results).

When the pilot project ended, DSHS contracted with the same evaluators to examine the effect of the ending of the existence of a Career and Wage Ladder that was recognized and subsidized by the state government. This “Post-CWL” evaluation utilized the same design and methodology that was in place during the three years of the pilot project: a comparison of two groups including centers selected by DSHS to be in the pilot project, and a matched comparison sample of centers, selected by the WSU researchers. A multi-method approach to data collection was used; 2 mail surveys completed by 137 centers, telephone interviews and observations with sub-sets of the centers. A summary of the results of the study are organized here by the major aims for the intervention: improvements in wage, benefits, education and retention. Before presenting those findings, center directors’ overall responses to the ending of the CWL are presented.

MAJOR FINDINGS

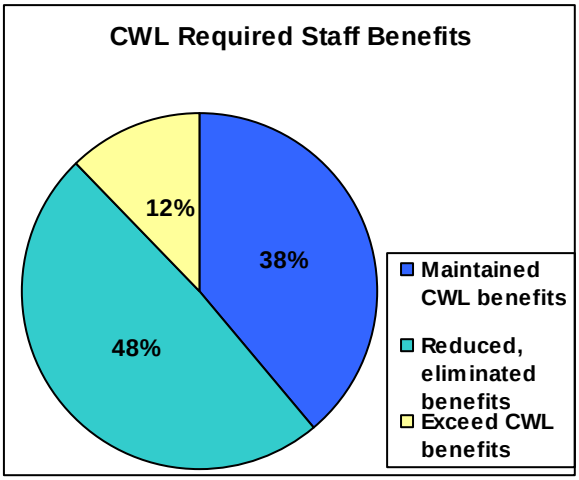
OVERALL RESPONSE TO ENDING OF CWL:

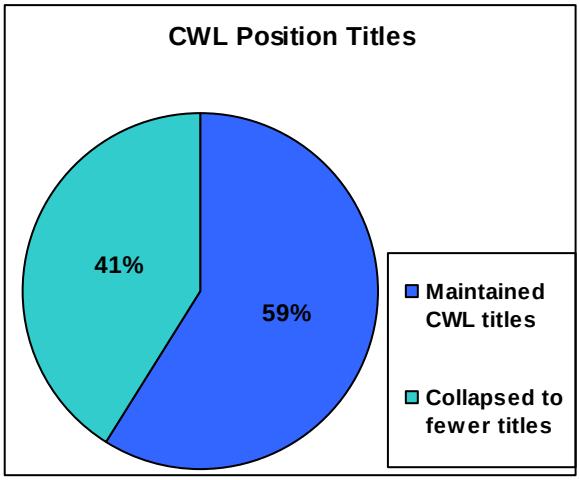
Center administrators were asked to generally describe how their centers had responded to the ending of the pilot project. While two centers indicated no adverse effects of the loss of the CWL, 27 centers reported having difficulty adjusting to its loss. The specific aspects of this difficulty are reflected in the table below. The themes they presented in answer to this question were repeated throughout the interview, while answering more specific questions: financial strain, maintaining wages of former pilot employees but lowering those of new hires, reducing staff benefits, finding it difficult to keep employees, and seeing decreased staff morale.

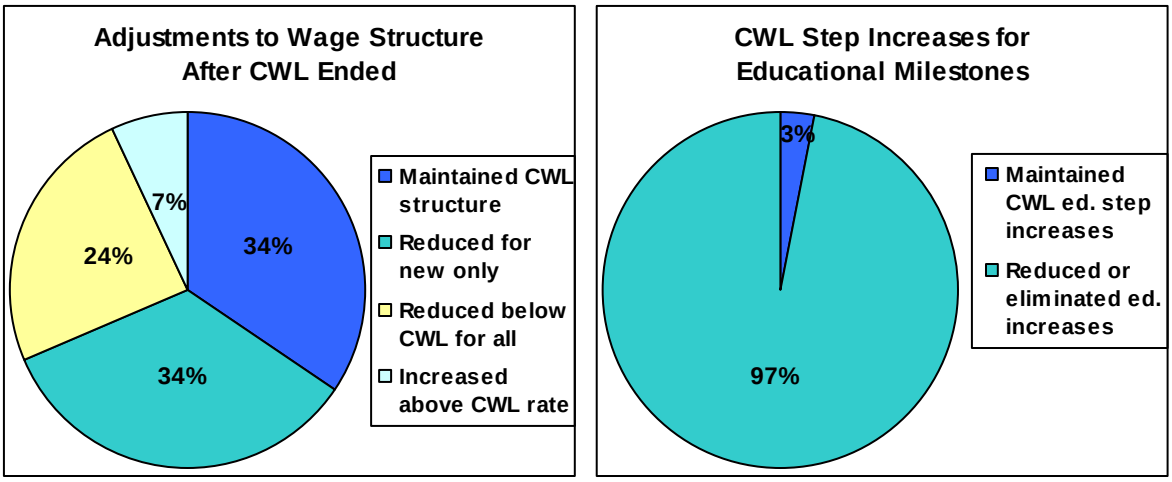


RESPONSE TO END OF CWL: STRUCTURAL CHANGES

Many center administrators reported attempting to maintain as much of the wage ladder as possible, even after the funding stopped. However, most also reported the need to make reductions in some parts of the wage ladder in order to be able to afford it. Figures below illustrate the variety of ways in which center administrators managed the loss of the CWL.







In summary, most former pilot centers reported experiencing financial strain resulting from the ending of the CWL. In responses, they made numerous structural changes in their policies from the policies required during the CWL. Common changes included:

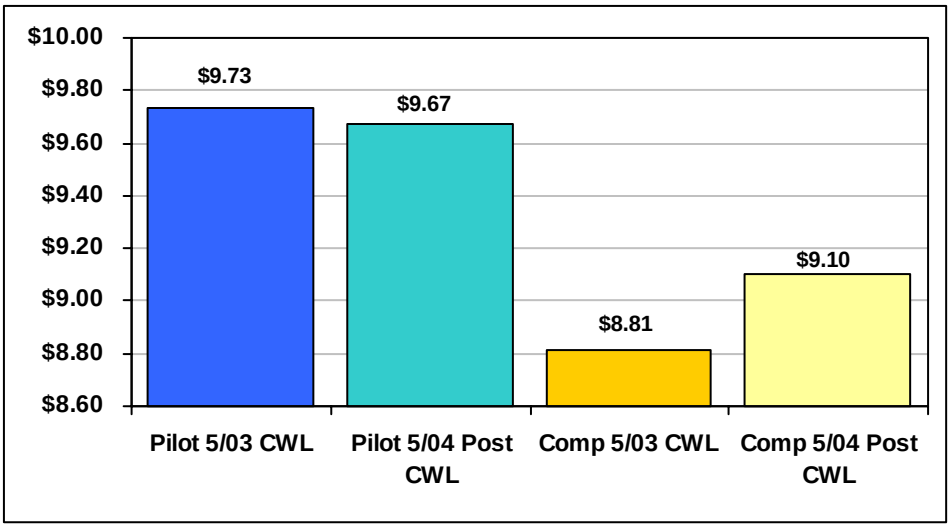
- Collapsing the CWL required management positions into one position (41% of centers),
- Reducing the total number of staff (36%)
- Reducing wages below those of the CWL for all employees or for new hires (58%),
- Reducing the CWL required entry salaries by position (66%),
- Reducing or eliminating the CWL required increases per educational step (97%),
- Reducing or eliminating the CWL required $.25/hour annual retention raises (62%),
- Reducing or eliminating the required CWL medical benefits or 12 paid leave days (48%),
- Increasing tuition (77%).

As a result of these changes, some centers reported having attracted less educated (54%), and less experienced (38%) job applicants. Few reported a reduction in parents' selection of their center. Finally, another marker of financial strain was the fact that almost the same number of former pilot centers closed in the 12 months after the ending of the CWL (7 centers) as had closed in the 3 years during the CWL (8 centers).

Results related to individual facets of the CWL (wage, benefits, education) are reported next.

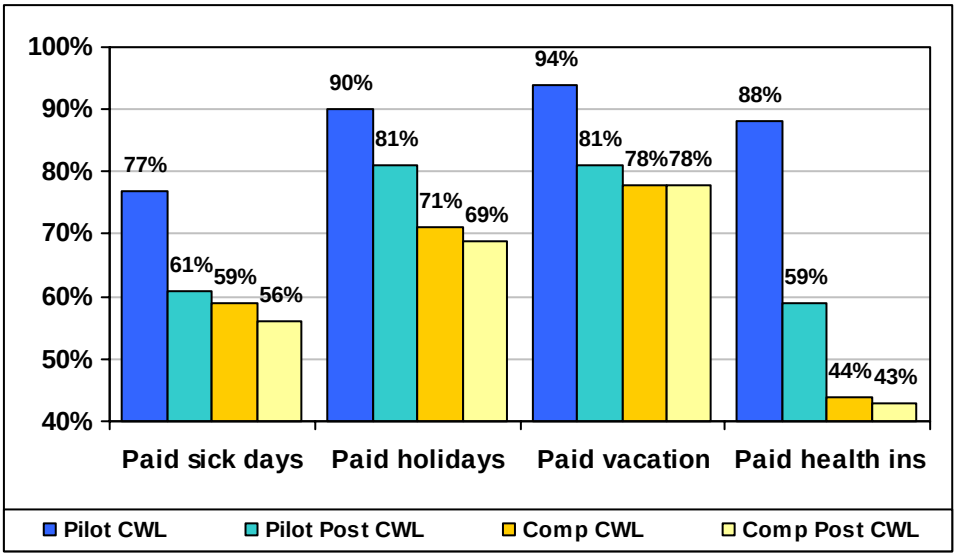
WAGES:

Wages in the former pilot group continued to be higher than those in the comparison group. However, for the first time since the beginning of the pilot project, wages in the Pilot group decreased. In May of 2003 the average wage for a provider in the Pilot group was $9.73. The average wage decreased to $9.67 in May of 2004. In contrast, the Comparison group wages increased in the 2003-2004 year. These findings can be explained by the requirement of annual minimum wage increases in Washington and the report from former pilot center directors that they attempted to, as much as possible, maintain wages for employees who were present during the pilot project. Thus, the increase in wage for comparison center employees is due to required annual minimum wage increases, while the wages of pilot center employees that had been present during the pilot project were maintained, resulting in former pilot center wages continuing to be higher than the comparison group, but not increasing.



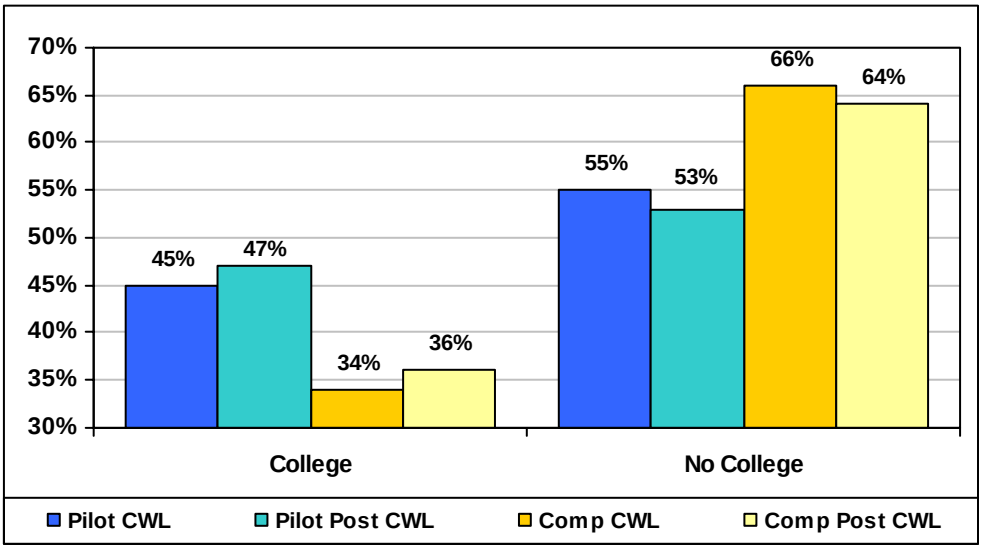
BENEFITS:

In the Post CWL year there were dramatic reductions in percentages of pilot centers offering staff benefits that had been required for CWL participation (minimum 12 days of paid sick, holiday, and/or vacation days; and $25 per month contribution to each employee's health insurance premium). By the last months of the CWL a considerably higher percentage of pilot centers offered each of the required benefits than did comparison centers (all differences between groups were statistically significant). However, by the end of the post CWL year for every required benefit a considerably lower percentage of pilot centers offered a benefit than had during the CWL (in three of the four cases these change amounts were statistically significant). Alternatively, about the same percentage of comparison centers offered each benefit at the end of the CWL and at the end of the post CWL year. Thus the ending of the CWL had a strong negative effect on the provision of CWL required staff benefits at former CWL centers.



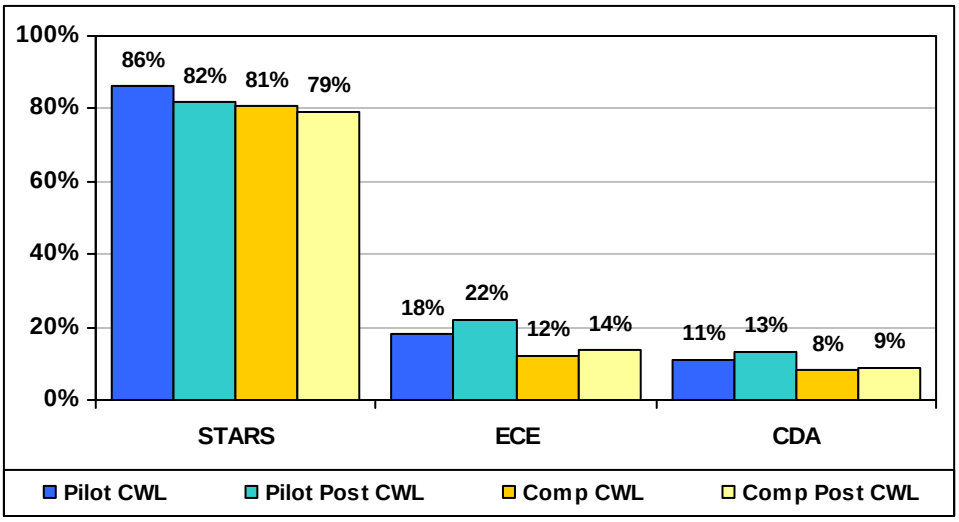
EDUCATIONAL ATTAINMENT:

The percentage of employees with or without any college education was about the same in May of 2003 and May of 2004. As was true during the pilot project, in 2004, more employees had no college than had some college. The proportion of employees with some college credits was higher in the pilot group both during the life of the pilot and one year after it ended. The slight change in percentage from 2003 to 2004 was not statistically significant for the pilot (p=*.78*) or the comparison employees (p=*.64*). The fact that the higher educational level in the former pilot employees was maintained after the end of the CWL can likely be explained by the fact that wages did not go down for those employees who had been present during the CWL. Because these employees' wages were maintained, they had less reason to leave their jobs. They had higher educational levels and thus the higher educational attainment of the pilot employees was maintained.



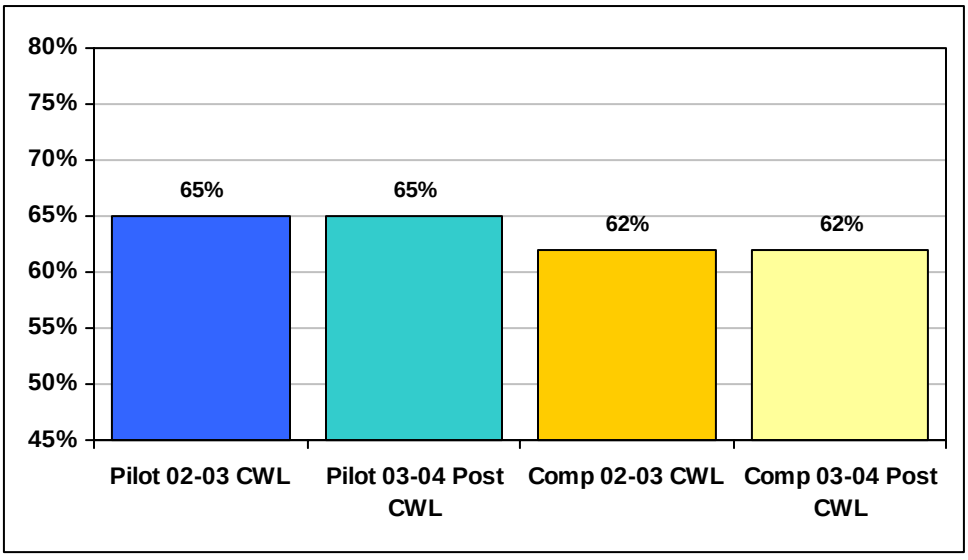
EDUCATIONAL PURSUIT:

For the former pilot employees, STARS workshop enrollment decreased in the post-CWL year, while ECE enrollment increased and CDA pursuit continued at the same rate. While ECE class enrollment continued to increase, the percentage of employees involved in these educational endeavors remained small in comparison with the proportion of employees seeking STARS workshops. The former comparison center employees showed no change in the percentage of employees pursuing any of the three types of education we tracked in this project. These results indicate that the former pilot employees' pursuit of STARS workshops and early childhood credits were related to the presence of the pilot funding, while the pursuit of CDA work was not.



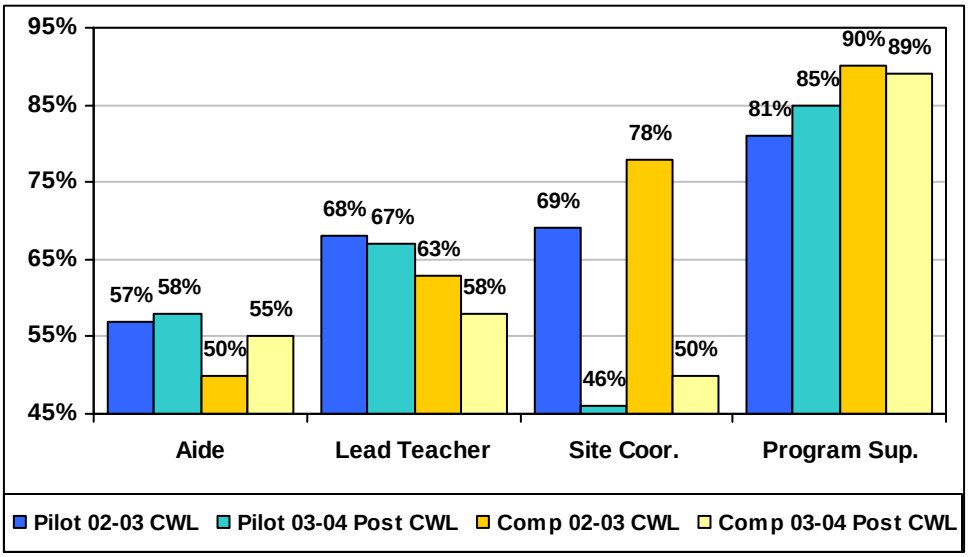
OVERALL RETENTION:

Similar to the finding during the pilot implementation, examining the retention of all employees during the year after the CWL revealed no differences in the overall percentage of employees who were retained at former pilot centers than comparison group centers. Thus the overall employee retention rates, and rate of leaving, do not appear to have been affected by the ending of the CWL project. This lack of effect on overall retention is thought to be due to the limited requirements for entry into a position. Without substantial requirements to enter the field, it is not surprising, given the difficulty of the work and the still limited wages that can be earned, that providing small wage increases did not improve retention for employees in general.



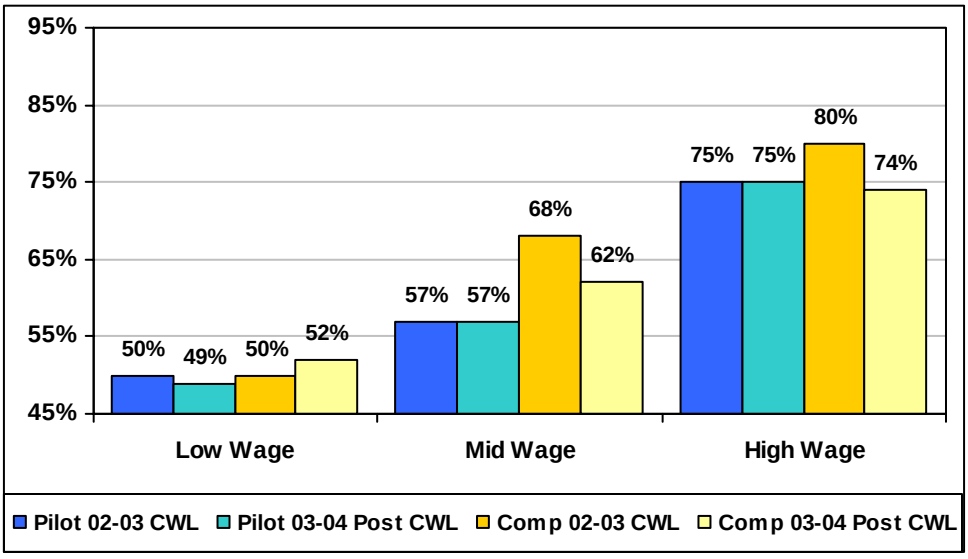
RETENTION BY POSITION:

Examining retention by position demonstrates that generally the higher the level of position, the greater the likelihood that employees would be retained. This was true during and after the CWL, and for both pilot and comparison groups. Using the pilot/comparison group analysis, the data suggests that there may have been a slight negative effect on the retention of pilot administrators. This pattern existed during the CWL and the year following the ending of the CWL.



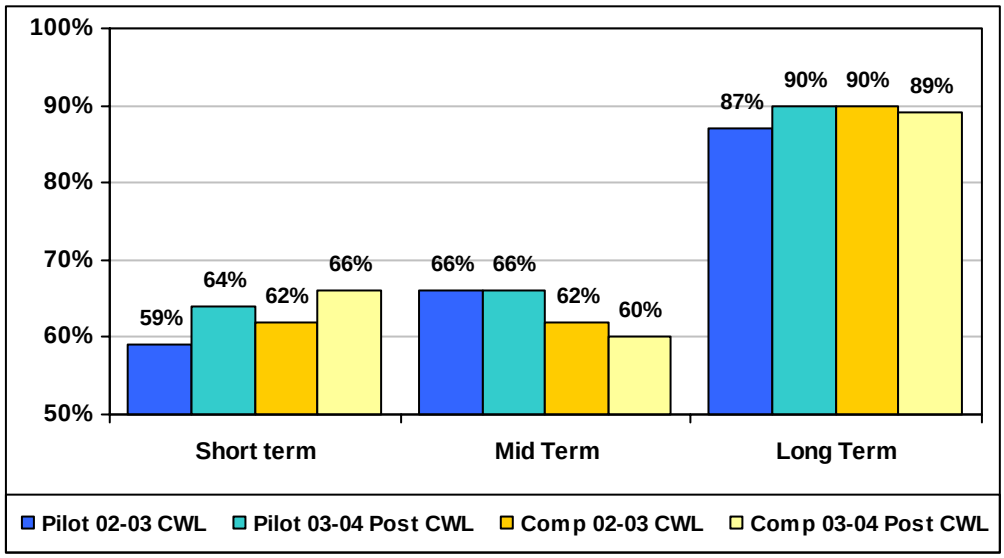
RETENTION BY WAGE:

Wage was highly related to retention (p=<.0001). Whether examining the pilot or the comparison group, or whether examining the last year of the pilot or the post CWL year, the higher an employee's wages, the more likely that employee was to be retained. There was no difference found in the patterns of retention by wage measured in the last year of the pilot versus the post CWL year.



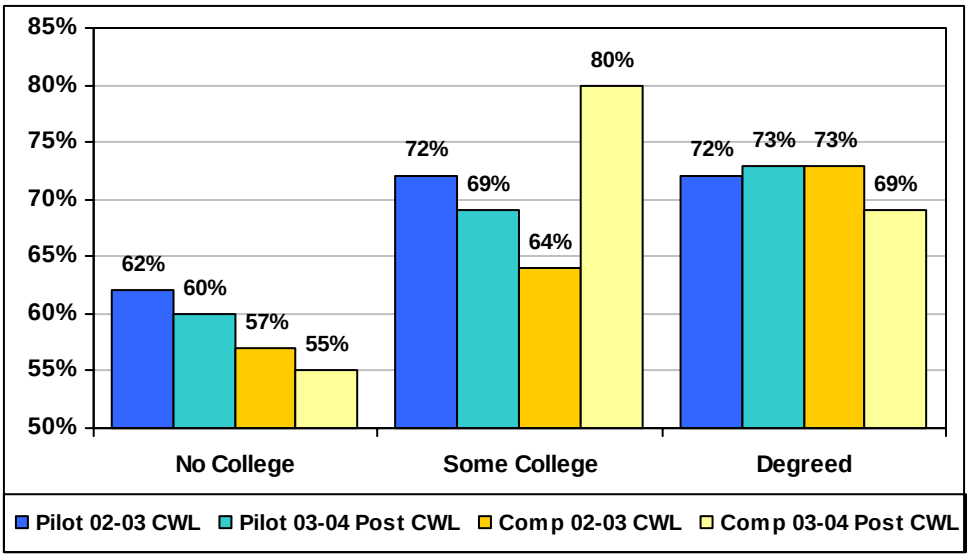
RETENTION BY LENGTH OF EMPLOY:

Examining retention rates of employees hired at different points in time reveals that the longer an employee had been at a center, the greater the likelihood that they would be retained. This pattern was true during and after the CWL period and for both pilot and comparison employees. However, the ending of the CWL seemed to have disrupted retention patterns for mid-term employees at former pilot centers, increasing their retention rate in the post CWL year, over what we found in the comparison group. This effect may be explained by wages. Mid-term employees were present during the pilot and their directors attempted to maintain their wage. Thus, these employees continued to stay at a greater rate than the comparison center employees after the ending of the pilot because they were receiving higher wages.



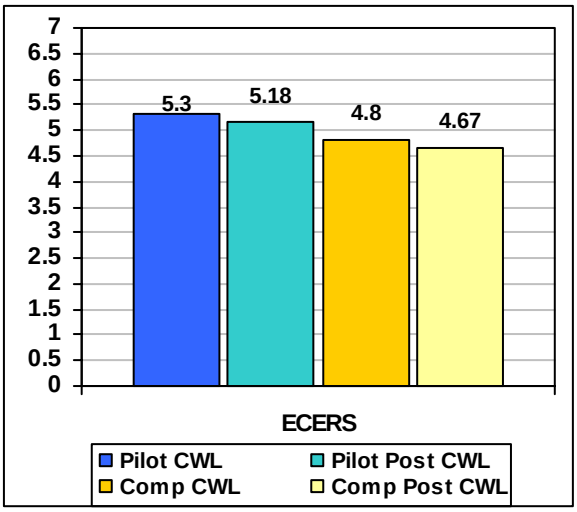
RETENTION BY EDUCATION:

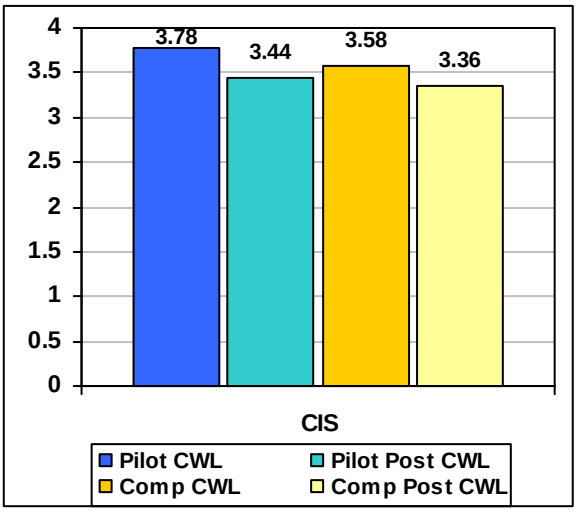
In the year subsequent to the pilot project, as during the CWL, a higher percentage of those with at least 15 credits of early childhood education were retained than those without such education. These findings were true for both pilot and comparison employees. The percentages retained by educational grouping were not statistically different for the pilot and comparison groups. These results illustrate the importance of education for retention. It appears that child care providers with even a few courses in early childhood education are easier to retain than those without any education.



QUALITY OF CARE:

Quality of care was assessed with the Early Childhood Environmental Rating Scale (ECERS) and the Caregiver Interaction Scale (CIS). In 2003, the total ECERS score was significantly higher in the pilot than the comparison centers. This difference was no longer apparent in 2004, after the ending of the CWL. In 2003, the CIS total score was significantly higher in the pilot centers. As with the ECERS, the significant difference in average CIS scores disappeared in the year following the end of the CWL. Thus, the ending of the pilot project was related to the disappearance of higher child care quality in the former pilot centers.





KEY FINDINGS AND IMPLICATIONS FOR POLICY

The results of this evaluation suggest that most aspects of the Washington Career and Wage Ladder were successful. Moreover, careful examination of the results provides specific direction for further attempts at intervening on issues of retention and quality in child care programs. The following represent some of the more salient recommendations indicated by the data from this study.

- **Interrelated components require comprehensive policies**

The results of this study indicate the inter-related nature of the various facets of the child care work force system. Retention is influenced by the education of the provider, wage is influenced by position which is related to how long the provider has been in the field, etc. Thus, any single intervention is less likely to be successful. A comprehensive policy, that addresses education as well as wage and benefits, is most likely to be effective in intervening upon the retention of child care providers.

- **Education makes a difference in retention**

The effect of education on retention was an important finding with serious implications for our policy regarding child care in Washington state. Previous research indicates that education is an important predictor of child care quality. This study indicates that having even a small number of early childhood credits is related to higher retention. The implication of this finding is that Washington state should require higher levels of education for its child care providers. Clearly, requiring higher levels of education will also require higher wages, another implication for policy.

- **Workers didn't make large gains in education**

The results showing how little education was pursued by incumbent workers, and those indicating no significant change in level of education during the project, indicate that expecting to quickly change education of current employees may be unrealistic at best. Consequently, policy makers may need to look to recruiting more highly educated (and highly paid) employees into the child care work force. However, the fact that any incumbent employees pursued education at all suggests policy should also continue to support providers who wish to achieve higher levels of education. The expectation of quickly achieving a degree is not realistic however.

- **Retention—No large scale effect; much quick turnover**

Low levels of retention indicate that the child care workforce is perhaps too easy to enter. That is, without a cost to entry, there is little to no cost to leave. The implication of this finding is that policy makers must require higher educational requirements for entry into the field, or provide incentives to incumbent workers to achieve higher levels of education (though see point above for complications of this). However, it is clear that higher levels of education cannot be required when wages are low.

- **Morale high during pilot, significant decrease when pilot ended**

The severe effects on morale with the ending of the Career and Wage Ladder pilot indicate the importance of sustaining such a program, if it is restarted. Sustainability may require a smaller scale effort. Two possible ways of decreasing the size of this program are offered here. First, the number of employees involved could be reduced by limiting eligibility to those who have gone beyond their probationary period, or to those who are lead teachers, or those who have completed some college credits and are willing to continue to pursue a degree. Second, the number of centers receiving funds could be reduced by limiting eligibility to those that have achieved some level of quality (accreditation is one measure).

CHAPTER 1

POST CWL EVALUATION STUDY OBJECTIVES AND DESIGN

Introduction

From July 1, 2000 until July 1, 2003 the Washington Department of Social and Health Services (DSHS) implemented a pilot project designed to improve the quality of child care received by DSHS subsidized children. Based on previous research findings, it was concluded that "by increasing wages and benefits, the retention and education of child care workers will be improved. This in turn is expected to raise the quality of child care and the professionalism of child care workers" (DSHS RFQ for the Research and Evaluation component of the Washington State Child Care Career and Wage Ladder Pilot Project, 1/5/00, p.1). Specifically, assumptions were that:

1. The higher staff educational attainment in early childhood education and child development, the higher the quality of child care provided;

2. The higher the percentage of staff who were retained for longer durations, the higher the quality of child care provided.

Addressing these assumptions, Washington Governor Gary Locke funded the Washington State Child Care Career and Wage Ladder Pilot Project (CWL) to supplement child care employee wages based on their educational and retention milestones reached, and to require centers to provide basic employee benefits. Funding included an evaluation component to determine the effect of increasing wages and benefits on retention and educational attainment of child care providers.

Upon completion of the Washington Child Care Career and Wage Ladder Pilot Project (CWL) in July of 2003, the Department of Social and Health Services (DSHS) contracted with the CWL evaluation researchers (Brenda J. Boyd and Mary R. Wandschneider) from the Department of Human Development at Washington State University, to evaluate the possible impacts of the ending of the CWL. Researchers had conducted the evaluation of the CWL and were able to utilize the data from the three-year study to augment the Post CWL evaluation.

These researchers were contracted with to determine how pilot centers fared after the completion of the CWL pilot, specifically whether centers: remained open or not, found outside funding to continue the wage ladder, maintained or changed their wage and benefit structures, experienced changes in the qualifications of employees hired, experienced changes in the quality of programming, etc. These researchers were also contracted with to determine how pilot employees fared after completion of the CWL pilot, specifically, whether employees': retention rates changed; pursuit of early childhood courses or workshops changed; wages and benefits changed; and, if they left the pilot centers, whether their reasons were associated with the discontinuation of the CWL.

RESEARCH QUESTIONS/OBJECTIVES OF POST CWL EVALUATION

A series of questions, agreed to jointly by DSHS and the researchers, drove the data collection and analysis of the Post CWL Evaluation. These questions related to: centers, employee behaviors, teacher attitudes and classroom behaviors, and classroom environment. For each area the general question was: **in the school year subsequent to the ending of the CWL did the findings stay the same or change from those discovered during the pilot period?** Following is a summary of the specific data examined:

1. **Centers:** Findings regarding closure rates; financial stability; funding of programs; policies/structure for employee position titles, wages and benefits.

2. **Employee Experiences:** Findings regarding employee wages; retention; reasons for leaving; educational attainment; and educational pursuit.

3. **Teacher Attitudes:** Findings regarding lead teachers': beliefs regarding developmentally appropriate practice; job satisfaction and intention to leave their current positions; and levels of professional identity.

4. **Classroom Environment and Teacher Behaviors:** Findings regarding the environmental quality of classrooms and sensitivity of teachers to children.

SAMPLE SELECTION AND MATCH BETWEEN PILOT AND COMPARISON GROUPS

Sample Selection Introduction

The design of the original Washington Child Care Career and Wage Ladder Pilot Project Evaluation, and the continuing longitudinal Post CWL study, was a comparison of two groups: (1) all the centers selected by the Washington Department of Social and Health Services (DSHS) and participating in the Pilot Project, and (2) a sample of matched licensed centers, selected by the WSU Pilot Evaluation research team. Following is a brief explanation of the sample selection process. For a detailed explanation of the DSHS process for selection of pilot centers and WSU researchers' process for selecting a comparison group, see the Washington State Child Care Career and Wage Ladder Pilot Project, Phase 2 Final Evaluation Report (Boyd & Wandschneider, 2004).

Selection of Pilot and Comparison Groups

In 2000 the Washington Department of Social and Health Services notified Washington licensed or certified child care centers that they could apply to be considered for participation in the Child Care Career and Wage Ladder Pilot Project (see DSHS RFQ no. 993462 for further details). To be eligible for participation a center was required to:

- Be licensed or certified through the state of Washington;
- Be a for-profit or not-for-profit organization (or individual)—not owned or operated by a governmental entity if the employees were government employees;
- Not currently subject to a licensing corrective action (through DSHS);
- Not currently under an active Child Protective Services (CPS) investigation;
- Been in operation for at least two years;
- Have a Washington business license;
- Meet criteria regarding restrictions on current or former Washington state employees.

Staff in the DSHS Children's Administration (project later moved to the DSHS Division of Child Care and Early Learning [DCCEL]) reviewed all applicants on these criteria and deemed them "Qualified" or "Not Qualified."

In addition to basic qualification data, centers also provided data on descriptors of their center (licensed capacity, percentage of DSHS enrollment, city, county), and on their employees (wages, position title, education level, months at the center, hourly wage, average hours working weekly). Of those centers which were "Qualified," DSHS used a "random, stratified" selection process to determine centers to offer acceptance into the pilot project. These decisions were based on the data collected in the applications and the state's calculation of state dollar amounts projected to be spent. The final number of centers participating was in flux for several months, but after some selected centers chose not to participate and others were found to be ineligible, the final number participating was 124, or 7%, of the approximately 1,840 licensed child care centers in Washington state at that time (see Table 1A below regarding characteristics of the Pilot group).

The goal in the comparison group selection was to have groups of comparison and pilot centers matched as closely as possible in center characteristics, at the start and end of the study. This would allow researchers to have confidence that these characteristics were not confounding causes of any differences between the groups found in the course of the evaluation. To this end, WSU researchers selected the comparison group centers from those which had requested the original Pilot Project RFQ, but had not submitted applications to be in the pilot project. Researchers utilized a random, stratified selection process to choose centers which closely matched the known characteristics of the pilot centers (see Table 1A below regarding characteristics of the Comparison group).

The sample selection categories included center: licensed capacity, number and percentage of DSHS funded children, urbanization level, DSHS region location, and location on east/west side of state. Categories were analyzed as follows (see Table 1A for the data for each described category).

Licensed Capacity. It was determined that the first, and most important criteria, would be size of center. The size of the center was measured using the reported "licensed capacity." As the Pilot Project was focused on staff, having similar numbers of staff in the Pilot and Comparison centers was desired. Center staff numbers are determined as state law mandated minimum ratios of staff to children. It was determined that by matching on licensed capacity, the number of staff reported in the surveys by the pilot and comparison groups would be likely to match most closely. To match on licensed capacity, researchers looked both at the average capacity of the comparison and pilot groups, and the range in capacity by groupings of 25 (how many with a capacity of 1-25, 26-50, etc.).

Number and Percentage of DSHS Funded Children in Program. To be eligible to be considered for either the pilot or the comparison group, a center was required to have at least 10% of enrolled children funded by DSHS. Comparison centers were selected to match pilot centers on their percentage of DSHS enrolled children.

Metro/Small Urban/Rural Designation. Using a guideline provided by DSHS (Licensed Child Care in Washington State: 1998), the researchers categorized the applicants as being from a metropolitan, small urban, or rural county. The researchers selected programs for the comparison group that resulted in distributions of centers in these three categories similar to that of the pilot group.

East/West Geographic Designation. The researchers used two different geographical variables. The first was east/west designation. All applicants were coded as being on the west side or the east side of Washington state (centers located in counties to the east or west of the Cascade Mountains—a common location distinction made in Washington state). Then comparison group centers were selected to best match the east/west proportions of the pilot group.

DSHS Geographic Region. The second geographical variable considered was by DSHS region. This was the most difficult variable to match, while maintaining a close match on other variables. There are six different DSHS regions within the state of Washington. Applicant centers were coded as being from one of the six regions. Researchers matched as closely as possible the comparison group to the pilot group by region; however, since eastern Washington has only one county designated as "Metro" (Spokane), it was not possible to perfectly match by size and eastern-western designation, as well as by DSHS region. See Table 1A for DSHS geographic region data.

Match of Post CWL Sample to Original Pilot Group

A high return rate is important to insure that the data collected is representative of the entire group under study. In this case, after a four year longitudinal study, and yearly attrition of centers, the final moderate return rate was still successful in providing a great deal of similarity between the final sample of 137 and the original 250 centers, as can be seen in Table 1A below. The data from the initial application for Pilot or Comparison involvement, (location, licensed capacity, and percentage of DSHS subsidized children) allowed us to compare our 137 respondents to the total sampling frame. Table 1A compares the characteristics of the groups, which indicates a great deal of similarity between the final sample and the total sampling frame. In analysis, none of the differences were found to be statistically significant.

Table 1A Sample Characteristics									
Characteristics	***ORIGINAL* Pilot Group**		***ORIGINAL* Comparison Group**		***POST CWL* Pilot Group**		***POST CWL* Comparison Group**		***POST CWL* Compare P/C Statistical Significance****
	#	**%**	**#**	**%**	**#**	**%**	**#**	**%**	
Total in Sample	124		126		69		68		137 Total Centers
Average Licensed Capacity	55 range 11-154		58 range 12-147		61		56		T Test p=.3828
Average % DSHS		48%		46%		45%		44%	T Test p=.8363
Metropolitan counties	73	59%	71	56%	39	56%	33	49%	Chi Square p=.4660
Small urban counties	27	22%	32	25%	15	22%	21	31%	
Rural counties	24	19%	23	18%	15	22%	14	21%	
East side of WA	37	30%	37	29%	18	26%	20	29%	Chi Square p=.6638
West side of WA	87	70%	89	71%	51	74%	48	71%	
DSHS Region 1	16	13%	24	19%	13	19%	15	22%	Chi Square p=.5199
DSHS Region 2	17	14%	10	8%	6	9%	6	9%	
DSHS Region 3	24	19%	20	16%	16	23%	7	10%	
DSHS Region 4	29	23%	31	25%	12	17%	13	19%	
DSHS Region 5	16	13%	19	15%	9	13%	11	16%	
DSHS Region 6	22	18%	22	17%	13	19%	16	24%	

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italic

METHODS TO ASCERTAIN IMPACTS OF THE ENDING OF THE PILOT PROJECT

In the year and a half subsequent to the ending of the Washington Child Care Career and Wage Ladder Pilot Project, the overall design of the evaluation was a comparison of two groups: (1) the centers which had been selected by the Washington Department of Social and Health Services (DSHS) and participated in the Pilot Project, and (2) a matched sample of licensed centers, selected by the WSU evaluation research team. Further, the design included a comparison of the data collected during the Pilot Project with the same type of data collected in the year following the ending of the CWL. In order to be comparing "apples to apples," because the Post Evaluation study only lasted one year, and the full pilot for

three years, many analyses compared the findings of the last year of the CWL (02-03) with the findings in the first year after the CWL (03-04).

Researchers utilized several different methodologies (survey, interview, observation) to ascertain the impacts of the ending of the pilot, including the four different measures described below.

1. **Mail Surveys:** 137 center directors (69 former pilot and 68 comparison) completed two mail surveys (October 2003 and May 2004) similar to those they had completed during the three years of the CWL. They provided information on their center, e.g., tuition rates, staff benefits provided, overall and DSHS number of children served, whether they were NAEYC accredited, etc. They also continued to report data on each employee, e.g., start and ending dates, wages, job title, age group worked with, educational attainment, educational pursuit, etc. (see chapters 3–6 and 8 for details on findings from the mail surveys). In order to compare data collected in the year subsequent to the CWL with data collected during the pilot, the sample selected to complete the mail surveys included all centers which had completed all evaluation mail surveys administered during the CWL project.

2. **Center Classroom Observation and Teacher Questionnaires:** A sample of 31 former pilot and 29 comparison center preschool classrooms were observed on site (spring 2004), implementing the same measures which had been used for on-site observations during the CWL. The observation sub-sample was a representative group of centers matching the selection characteristic percentages described above under Sample Selection. A single site visit to each center provided the forum for collection of both the observational and questionnaire data. All observation questions pertained to lead teachers in classrooms serving 3–4-year-olds, observed in the classroom for which they had primary responsibility for planning and implementing both the curriculum and the classroom environment. Observers utilized child care quality measures (ECERS-R and CIS) in three-hour classroom observations. Classroom teachers completed attitude, belief, and commitment to the profession questionnaires upon completion of the observations. In order to compare data collected in the year subsequent to the CWL with data collected during the pilot, the sample selected to participate in the observations included the same centers which had participated in the classroom observations during the last year of the CWL (see chapter 7 for details on findings from the observations).

3. **In-Depth Telephone Interviews:** A sample of 58 directors at 29 former pilot and 29 comparison centers were interviewed via telephone (October 2003 and May 2004). The telephone interview sub-sample was a representative group of centers matching the selection characteristic percentages described above under Sample Selection. Interviewers conducted in-depth, structured interviews asking questions about how the centers had responded to the ending of the CWL, e.g., intention to close/stay in business; how centers had dealt with the elimination of wage enhancement funds from the state (finding other funding, changing their pay structure, etc.); financial implications; changes in center policies such as revised position titles, wages, retention increases, staff benefits, etc. (see chapters 2 and 8 for details on findings from the telephone interviews).

4. **Short Follow-up Telephone Interviews:** One and one-half years after the ending of the CWL (December 2004) all former pilot centers (124), and all comparison centers which had responded to the final mail survey completed during the CWL (80), were contacted to ascertain whether they were still in business and whether they anticipated being in business in 2005 (see chapter 2 for details on findings from the short telephone interview).

Table 1B illustrates the timing of data collection and the measures utilized.

Table 1B Post CWL Evaluation Measures Administered			
Mail Survey	Oct. 2003	May 2004	
In-Depth Telephone Interview	Oct. 2003	May 2004	
Observation & Teacher Questionnaire		Feb.–April 2004	
Short Telephone Interview			Dec. 2004

HUMAN SUBJECTS REVIEW PROCESS (DSHS, WSU)

As with any research conducted by faculty at Washington State University, this project proposal underwent WSU Institutional Review Board examination for protection of human subjects. In addition, all protocols and instruments were reviewed and approved by the Washington State Institutional Review Board (formerly known as the DSHS/DOH Human Research Review Board).

COMPENSATION OF FORMER PILOT AND COMPARISON GROUP CENTERS

During the Post CWL Evaluation, both former pilot and comparison centers were compensated for their time in participating in the study. Participating centers were reimbursed $100 for completion of each of two written director surveys ($200 total). The subgroup of pilot and comparison centers participating in the in-depth telephone interviews were reimbursed an additional amount, $50 per interview ($100 total). The subgroup of pilot and comparison centers participating in the classroom observations and teacher questionnaires were each reimbursed an additional amount, $100 per center.

Upon receipt of completed mail surveys, or completion of observational and interview data collection, WSU's research assistant processed forms and gathered center director signatures. These forms were then submitted to DSHS. DSHS mailed checks directly to the appropriate centers.

DISTRIBUTION METHODS AND PROCESS TO FACILITATE ACCURATE DATA

Telephone Interviews

For the telephone interviews, researchers selected sub-samples to match the characteristics of the full sample (see above). Our research assistant called center directors, explained the purpose and process of the telephone interview, including the fact that centers would be compensated $50 for completion of each interview, and scheduled an appointment for the interview. In the fall of 2003 all selected respondents agreed to be interviewed. Interviewers called at the appointed hour and completed the phone interview. Occasionally interviews were rescheduled when respondents were unavailable at the appointed hour. In the Spring of 2004 1 pilot and 1 comparison center director declined to be interviewed. To facilitate accurate data entry, responses were typed exactly as spoken and the interviewer repeated back open-ended responses to assure the words were typed correctly.

Observations and Teacher Questionnaires

For the classroom site observations and teacher questionnaires, researchers selected the same sub-sample of centers which had participated in the observations and teacher questionnaires during the CWL pilot evaluation. Our research assistant called center directors, explained the purpose and process of the observation and teacher questionnaires, including the fact that centers would be compensated $100, and scheduled the site visit. See Chapter 7, description of the observation and questionnaire findings, for an explanation of the extensive methods utilized to assure accurate data was collected during site visits.

Mail Surveys

As had been done during the CWL evaluation, for the Post CWL evaluation the principle investigators contracted with the Social and Economic Survey Research Center at WSU to manage the mail survey data collection process. This center has developed a procedure of survey data methodology that has consistently produced high return rates. A first mailing of a single survey, along with a cover letter, informational brochures for employees, and A-19 forms to the comparison group centers (for the purposes of DSHS paying the center for completion of its survey) were mailed to centers via priority mail and included a self-addressed, stamped return envelope. A follow-up post card was sent to the centers from which we had not yet received a response (see Appendix for various correspondence accompanying surveys). A second mailing that included a second survey was sent to centers from which we had not yet received a response.

In addition to this intensive process typically used by SESRC, evaluation research assistants spent numerous hours calling all centers with non-returned surveys to check whether they had received surveys, answer any questions they might have, and obtain missing data or correct unclear data. If appropriate, assistants sent a third survey to these non-respondents, and stated deadlines for return of the survey.

In order to assure that collected data was accurate, our research assistant also spent numerous hours contacting mail survey respondents to obtain missing data or correct unclear data. She has had numerous years of experience in the child care field, and was familiar with what directors meant by responses. Prior to coding, she made calls to any centers that had sent in a survey that was obviously incomplete (had forgotten page 1, etc.). Later, when coding began, several issues needed clarification and additional calls were made. For example, a completed survey that had listed 21 staff on Q15 and 14 staff on Q16 needed to receive a clarification call, etc.

In summary, the processes used to increase mail survey return rate included: (1) direct financial incentive to centers; (2) surveys priority mail delivered, stamped return envelopes, post card follow-up, second mailing, and (3) intensive phone follow-up. Assuring data accuracy was accomplished through phone follow-up.

CHAPTER 2
RESULTS: TELEPHONE and MAIL SURVEY

HOW CENTERS RESPONDED TO ENDING OF THE WASHINGTON CHILD CARE CAREER AND WAGE LADDER: Changes to Wage, Benefit, Position Title Structure

Introduction

Upon completion of the Washington Child Care Career and Wage Ladder Pilot Project (CWL) on June 30, 2003, the requirements no longer existed, nor did the payments from the Department of Social and Health Services (DSHS). This Washington State University Post Evaluation Study (Boyd, B. and Wandschneider, M.) evaluates the impacts of the ending of the CWL. This chapter focuses on (1) the CWL related structural changes made by former pilot centers upon completion of the pilot project (changes in position titles, wage structure, rules for raises related to staff education and experience, benefit package offered, etc.); and (2) the perceptions of directors of the impacts of the ending of the CWL. The chapter will also provide information about how centers funded the changes they made (tuition changes, etc.) and their plans and reasons for possible closing of their businesses.

As background, the Washington State Child Care Career and Wage Ladder Pilot Project was a collaboration between 124 of the approximately 2,000 licensed or certified child care centers across Washington, and the Washington State Department of Social and Health Services (DSHS). DSHS developed a career and wage ladder establishing specific positions and related wages based on teacher education and experience. Participating Pilot Project child care centers agreed to adopt this career ladder. Increasing base wages and levels of education were required for each increased step of the ladder. A state appropriation paid for teacher wage increments based on educational milestones completed by staff (typically $.50 increases per educational step). The Pilot Project child care centers paid for teacher wage increments based on experience ($.25 increase for each year of employ at the center). The state also paid for part of the experience increments for those centers which enrolled more than 25% DSHS tuition subsidized children. Further, the centers were required to provide minimum specified health and leave day staff benefits. Centers paid for these benefits without subsidy from the state. The state paid a 15% administrative fee to participating centers (15% of their total wage supplement received from DSHS). Some centers chose to use their administrative funds to cover a portion of the required staff benefits.

Methods: Introduction

With the ending of the Career and Wage Ladder Pilot Project on June 30, 2003, centers were no longer required to maintain the CWL structure, and received no funds from the state to do so. Three structured telephone interviews were conducted with directors of former pilot centers in order to determine what their perceptions were of the impact on their center of the ending of the CWL; changes centers made in position titles, wage structure, rules for raises related to staff education and experience, and benefit package offered; how centers were paying for changes they had made; and their intentions regarding staying in business. See Table 2A for a summary of the timing of the telephone interviews.

Table 2A Post CWL Evaluation: Timing of Telephone Interviews			
In-Depth Telephone Interview	Oct. 2003	May 2004	
Short Telephone Interview			Dec. 2004

For the Short Telephone Interview, completed in December of 2004, all former pilot centers, and all comparison centers which had participated in the three-year study, were contacted. The purpose of this inquiry was to determine if the ending of the CWL had changed the pattern of center closures noted during the CWL. If a center no longer had an operational telephone number, the local DSHS DCCEL office was contacted to determine if that center had closed (see Chapter 1 for further protocol information). Centers were asked whether their center was still in operation and whether they expected to remain in operation in 2005.

For the In-Depth Telephone Interviews, completed in October of 2003 and May of 2004, a more elaborate protocol was utilized, including mailing of a letter, calling to schedule an appointment, and then calling to complete the approximately half-hour interviews (see Chapter 1 and Appendix for further information regarding interview protocol and questions, payment of responding centers, Human Subjects review, etc.). Center directors were asked a similar set of questions in the fall and spring. The questions provided in-depth information about directors perceptions regarding the ending of the pilot and how their center had structured its positions, wages, and benefits after the ending of the CWL. The format of the telephone questionnaire allowed the interviewer to be able to complete follow-up questions whenever responses were unclear (see Appendix for specific questions included in the interviews).

In-depth telephone interviews were completed with a sample of pilot and comparison centers. These samples were selected as representative groups matching the full pilot and comparison groups in all the characteristics utilized throughout the study. The sample selection categories included center licensed capacity, number and percentage of DSHS funded children, urbanization level, DSHS region location, and location on east/west side of state. Table 2B depicts the characteristics of the telephone interview samples and demonstrates their close match with the original pilot group. None of the small percentage differences between groups were found to be statistically significant.

Table 2B 2004 CWL Director Telephone Survey Pilot Group Sample Compared to Full Original Pilot Group			
		Oct. 2003 and May 2004 Phone Interview Sample	
	Original Full Pilot	**Former Pilot**	**Comparison**
# of Centers	124	29	29
Average licensed capacity	55 Min.: 11 Max.: 154	59 Min.: 20 Max.: 125	52 Min.: 17 Max.: 117
Aver. % DSHS children	25 (48%)	21 (40%)	21 (43%)
East side WA	37 (30%)	9 (31%)	8 (28%)
West side WA	87 (70%)	20 (69%)	21 (72%)
Metro	73 (59%)	17 (59%)	14 (48%)
Small Urban	27 (22%)	7 (24%)	9 (31%)
Rural	24 (19%)	5 (17%)	6 (21%)
DSHS Region1	16 (13%)	5 (17%)	4 (14%)
DSHS Region 2	17 (14%)	4 (14%)	4 (14%)
DSHS Region 3	24 (19%)	6 (21%)	5 (17%)
DSHS Region 4	29 (23%)	6 (21%)	6 (21%)
DSHS Region 5	16 (13%)	4 (14%)	4 (14%)
DSHS Region 6	22 (18%)	4 (14%)	6 (21%)

Methods: Questions and Queries In-Depth Telephone Interviews

Researchers selected telephone interviews as a means to gather data about centers' structural changes to, and perceptions about, responses to the ending of the CWL. The telephone format allowed interviewers to ask follow-up questions and gather much detail. Pilot center directors were asked 31 questions. Most queries started with a close-ended question, such as, "CWL centers were required to provide particular staff benefits. Without the CWL administrative dollars or requirements, has your center maintained the CWL benefit requirements?" If a respondent answered "No," a follow up open-ended question was asked; e.g., "What changes in the benefit package did your center make?" If the respondent did not explain the policy regarding one of associated CWL benefits, the interviewer would prompt further; e.g., "Would you please describe your health insurance benefit system." Interviewers typed all responses exactly as stated.

Methods: Content Analysis of Responses In-Depth Telephone Interviews

Upon completion of all telephone interviews, participant identifying information was stripped from responses. A standard qualitative study technique was used to review the responses (constant comparative analysis). The actual text responses were separated by question. The responses from each question were then coded and placed into response categories which were based on shared ideas or themes. Two researchers completed this sorting process independently. The researchers then compared their groupings and came to agreement on the response categories. Researchers then tallied the number of responses

for each given category by question. This process continued for all telephone interview questions.

Findings: Overall, In-Depth Telephone Survey

For purposes of this chapter, focusing on structural changes former pilot centers made after the ending of the CWL, data will be provided regarding the responses of former pilot centers (not comparison centers). In the fall of 2003, a few months after the ending of the CWL, when first interviewed, many former pilot directors' responses were uncertain and unclear regarding how their center would respond to the ending of the project. For instance, when asked about the annual $.25 per hour retention raise, one director said "we haven't decided yet what to do about that, how much we'll have to cut back; we're just taking it one day at a time." By May of 2004, nearly a year after the ending of the CWL, directors were very clear about the policies they had adopted. Thus the remaining tables depict the responses of former pilot directors in May of 2004, after their policies had stabilized.

Before going into specific areas, the first question asked directors to describe generally how their centers had responded to the ending of the CWL. Table 2C shows their responses. Whereas two centers said they were experiencing no differences and were doing fine financially, and in fact had seen an increase in the professionalism of their staff, the remaining 27 centers reported having had a difficult time adjusting to the end of the CWL. The themes they presented in answer to this question were repeated throughout the interview, while answering more specific questions: financial strain, maintaining wages of former pilot employees but lowering those of new hires, reducing staff benefits, seeing less educational pursuit, finding it difficult to keep employees, and seeing decreased staff morale. However, even with financial strain, in examining the specifics of what centers did, 22 of the 27 centers maintained some or all of particular elements of the CWL (see remaining Tables).

Table 2C
After Nearly a Year Since the CWL Ended, How Has Your Center Responded?
(N = 29 Former Pilot Centers)

	%*	#*
Financial difficulties/strain, made reductions to adapt to CWL end	76%	22
Decreased benefits/wages (e.g., smaller raises, eliminated raises, fewer leave days, decreased or eliminated health benefits)	31%	9
Maintained last CWL wages of former CWL employees, reduced/eliminated continuing increases; newly hired staff paid below CWL rates	28%	8
Employees left, let go, or harder to keep or hire	34%	10
Decreased staff morale, disappointment	31%	9
Staff stopped pursuing education/training with elimination of $ incentives	7%	2
Center experiencing no differences, financially doing fine (**)	7%	2
Professionalism & advocacy have improved due to CWL (same centers as **)	7%	2

*More than 1 response possible, greater than 100% possible

Findings: Applicant Pool, Mail Survey

We also asked several questions in the mail surveys (see Chapter 1 for protocol on the mail surveys) regarding whether the ending of the CWL had an impact on the centers' applicant pool: numbers of applicants, applicants with lower educational attainment, applicants with less prior experience, and fewer applicants who were offered positions accepting them. A relatively small percentage of directors reported fewer applicants in the year following the ending of the CWL (20%). However more than half reported that their applicants had lower educational attainment levels than had their applicants during the CWL, and about one-third reported applicants with less prior experience (see Table 2D for details).

Table 2D
Applicant Pool in the Year After the CWL Ended
(N = 69 Former Pilot Centers (Mail Survey Data)

	%*	#*
Fewer applicants	20%	14
Applicants have lower educational attainment levels	54%	37
Applicants have less prior experience	38%	26
Fewer applicants accept positions, once offered	19%	13
No changes in applicant pool	30%	21

*More than 1 response possible, greater than 100% possible

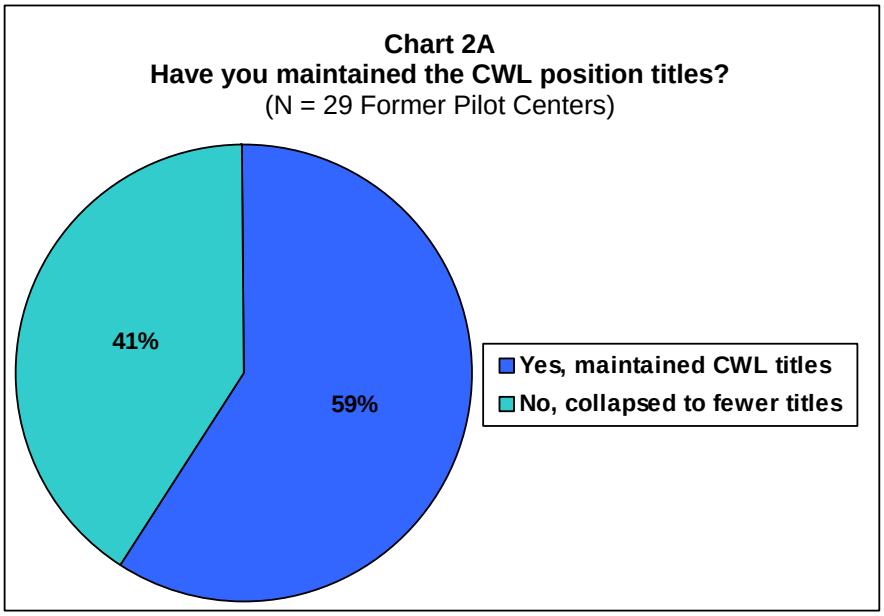
Findings: CWL Position Titles

One of the stipulations for participation in the CWL included centers agreeing to utilize the position titles listed in the WAC (Washington Administrative Code) for child care licensing: Aide/Assistant Teacher, Lead Teacher, Site Coordinator, and Program Supervisor. Table 2E illustrates that 59% of centers maintained those CWL job titles (also see Chart 2A for a graphic depiction). The remaining 41% of centers collapsed job titles into fewer categories: all of them combined the 2 CWL management positions into 1 position, and some also combined the Aide/Assistant and Lead Teacher into one Teacher position.

Table 2E
Have You Maintained the CWL Position Titles?
If Not, What Position Title System is Your Center Using?
(N = 29 Former Pilot Centers)

	%*	#*
Use CWL titles (Aide/Assistant, Lead Teacher, Site Coordinator, Program Supervisor	59%	17
No, use different system than CWL per below	41%	12
Combined 2 CWL management positions into 1	41%	12
Combined 2 CWL teaching levels into 1	10%	3

*More than 1 response possible, greater than 100% possible

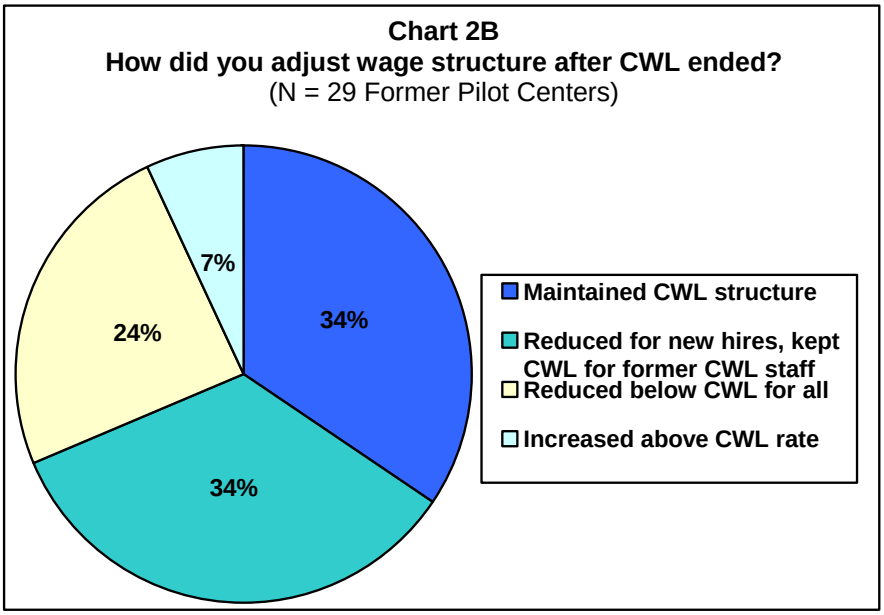


Findings: Wage Structure

A combination of funds from DSHS and participating centers supplemented the wages of employees based on job title, level of educational attainment and numbers of years of employment at that center. Before asking about each specific part of the wage structure, we first asked a closed ended multiple choice question about after the ending of the CWL if/how their center had adjusted its wage structure. Table 2F illustrates that about one-third of respondents reported that they had maintained the CWL wage structure for all employees, about one-third stated they had retained the last CWL wage for employees formerly on the ladder structure (most, however, had not continued to honor earned raises in the year after the CWL ended) but had decreased wages for new hires, about one-fourth had reduced wages for all employees, and 7% had increased wages above CWL rates for some employees (see Chart 2B for a graphic depiction).

Table 2F
How Did You Adjust Wage Structure After CWL Ended?
(N = 29 Former Pilot Centers)

	%	#
Maintained CWL wage structure for all staff	34%	10
Reduced wages from CWL rates for new hires, maintained CWL rates for those previously paid by CWL (most stated did not give retention/education raises this year)	34%	10
Reduced wages from CWL rates for all employees	24%	7
Increased wages above CWL rates for some staff	7%	2



Findings: If Maintained All/Part of CWL Wage Structure, How Paid For

For the 22 of 29 centers (76% of the total) which had reported maintaining or increasing part or all of the CWL wage structure, Table 2G depicts how they paid those wages without the CWL supplements. Most centers were using a combination of strategies. The most common was raising tuition (77% of centers did this). However, in order to maintain some higher wages, centers also used methods that made staff working conditions worse such as reducing or eliminating staff benefits (50%), reducing total numbers of staff (36%), reducing wages for some staff (32%). Some centers implemented innovations, such as raising funds through donations, fund raising, endowments, and investments. One center mentioned opening a latte stand in the center's parking lot to help pay for staff wages. Another was renting out office space in her building. Another director mentioned obtaining a second job at night in order to keep her teachers' wages up. However, this director was also contemplating closing her center because she didn't think she could keep two jobs going, she wasn't willing to pay her staff less, and she had not been able to raise sufficient funds in other ways. Two centers had resorted to accepting fewer DSHS subsidized children so they could enroll children whose parents paid the center's tuition rate (which was higher than the DSHS tuition rate).

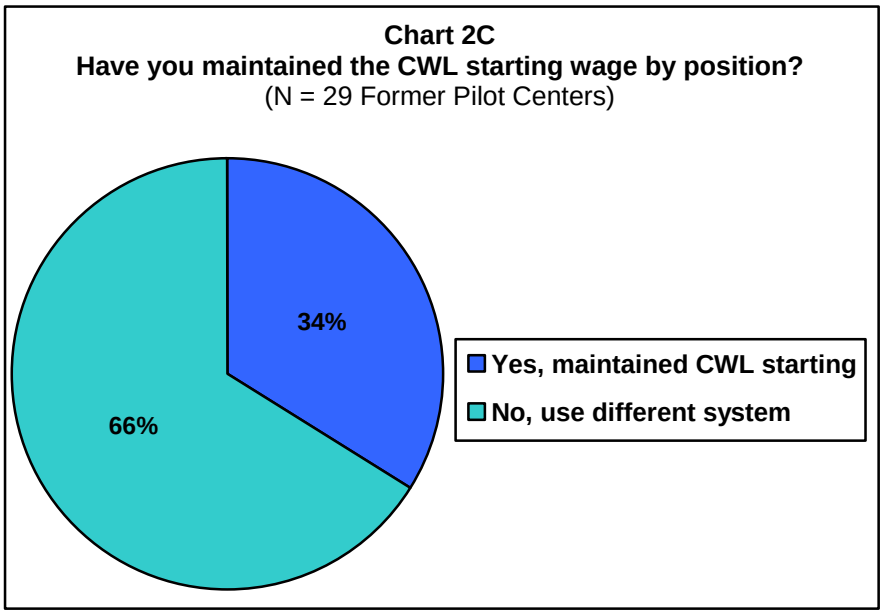
Table 2G **If Maintaining Some/All CWL Wage Structure, How Paying For It Without CWL?** (N = 22 Former Pilot Centers Maintained some/all of CWL Wage Structure)		
	%*	**#***
Raised tuition	77%	17
Reduced or eliminated staff benefits	50%	11
Reduced number of staff	36%	8
Reduced wages for some employees	32%	7
Raised funds through donations, fund raising, endowments, investment	32%	7
Increased number of children enrolled	18%	4
Reduced number of staff to children	14%	3
Reduced number of DSHS children accept, so enroll more full tuition paying children	9%	2

*More than 1 response possible, greater than 100% possible

Results: Wage Increases by Position

In addition to stipulating that centers adopt certain job titles, the CWL was designed so that a higher educational level was required for each higher position and a particular starting wage was required for each job title. With the ending of the CWL, we asked whether centers had maintained the $1 per hour increase per position starting wage. About one-third had maintained those levels, two-thirds had not. See Table 2H for the starting wages by position adopted after the CWL ended (see Chart 2C for a graphic depiction).

Table 2H **Have You Maintained the CWL Educational Step Starting Wage Amount by Position? If Not, What Does Center Use?** (N = 29 Former Pilot Centers)		
	%	**#**
Maintained CWL educational/position step starting amounts	34%	10
No, use different system than CWL per below	66%	19
Starting wage Aides/Assistant Teachers	Average: $7.35 Range: $7.16–9.00	
Starting wage Lead Teachers	Average: $7.83 Range: $7.16–9.00	
Starting wage Site Coordinators	Average: $9.26 Range: $7.16–12.00	
Starting wage Supervisors	Average: $10.83 Range: $7.16–15.00	

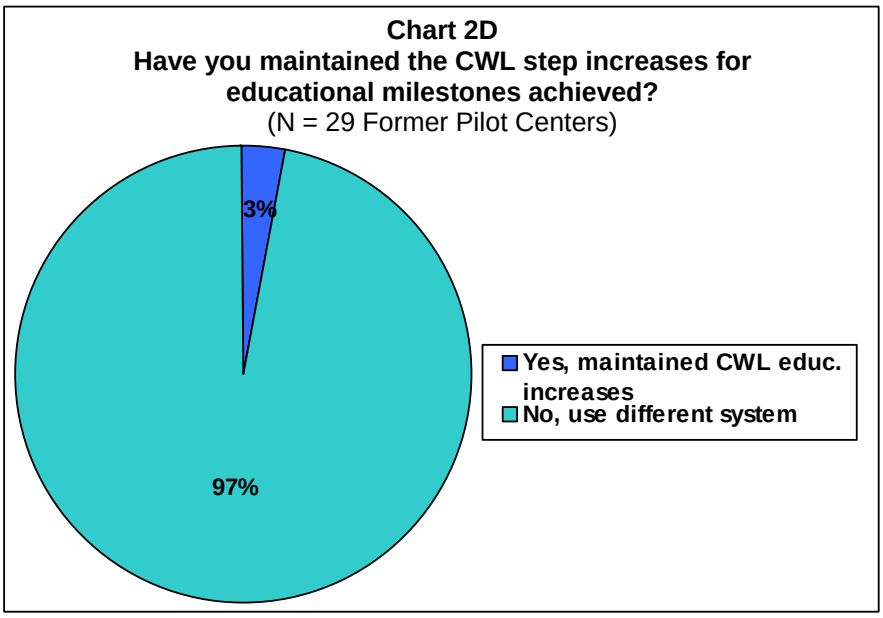


Findings: Educational Milestone Wages Increases

Another stipulation of the CWL was that a $.50/hour raise be provided when an employee reach the next of the nine educational achievement levels. Thus the higher the educational attainment of employees, the higher their wage. When asked whether centers had maintained this portion of the Career and Wage Ladder structure, only 1% reported having done so. Most (62%) reported now giving no increases based on educational attainment. About one-fourth stated they still gave educational attainment increases, but at a lower rate than those stipulated in the CWL (see Table 2I for details and Chart 2D for a graphic depiction).

Table 2I
Have You Maintained the CWL Step Increases For Educational Milestones Achieved? If Not, What is Center's Policy?
(N = 29 Former Pilot Centers)

	%	#
Maintained CWL step increases for educational milestones achieved	3%	1
No, Use different system than CWL per below	97%	28
No wage increases made for educational attainment	62%	18
Make educational attainment increases, but lower than CWL amounts	28%	8
Make some educational attainment increases, determined on an individual basis	7%	2
Educational increases vary by type, STARS worth less than for-credit courses	7%	2

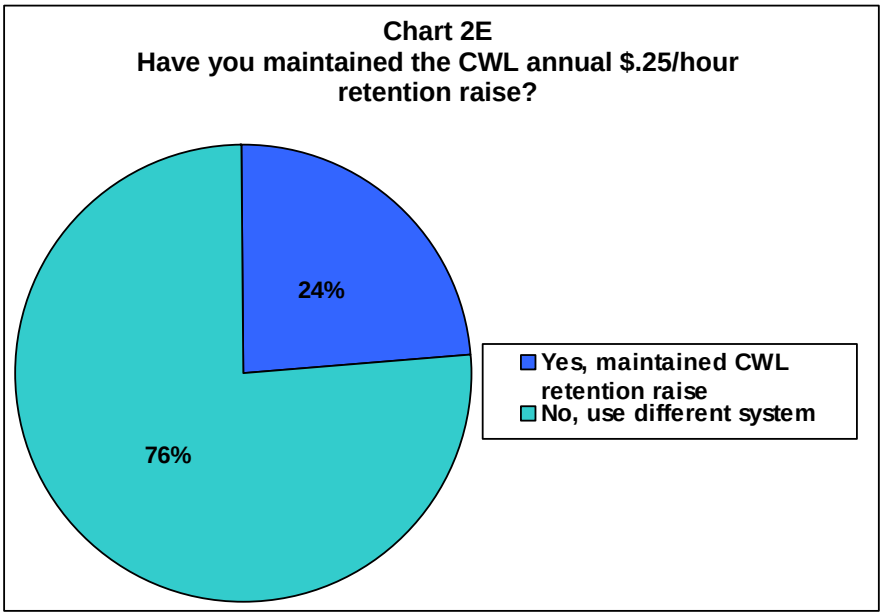


Findings: Retention Wage Increases

Another stipulation of the CWL was that for every year (for up to 5 years) that employees stayed at a center they would receive a $.25 per hour per year wage increase. Thus, even if employees did not increase their educational attainment level or their position level, they would receive a $.25 per hour raise each year. When asked whether centers had maintained this portion of the Career and Wage Ladder structure, 24% reported having done so. Most who had not kept the CWL retention raises, gave no kind of retention raise at all (see Table 2J for details and Chart 2E for a graphic depiction).

Table 2J
Have You Maintained the CWL Annual $.25/hour Retention Raise?
If Not, What is Center's Retention Raise Policy?
(N = 29 Former Pilot Centers)

	%	#
Maintained CWL annual $.25/hour retention raise	24%	7
No, use different system than CWL per below	76%	22
No retention raises given	41%	12
More than $.25/hour ($.50 or 2-4% of wage)	14%	4
Less than $.25/hour	10%	3
Nothing consistent, raises depend on performance not longevity	10%	3

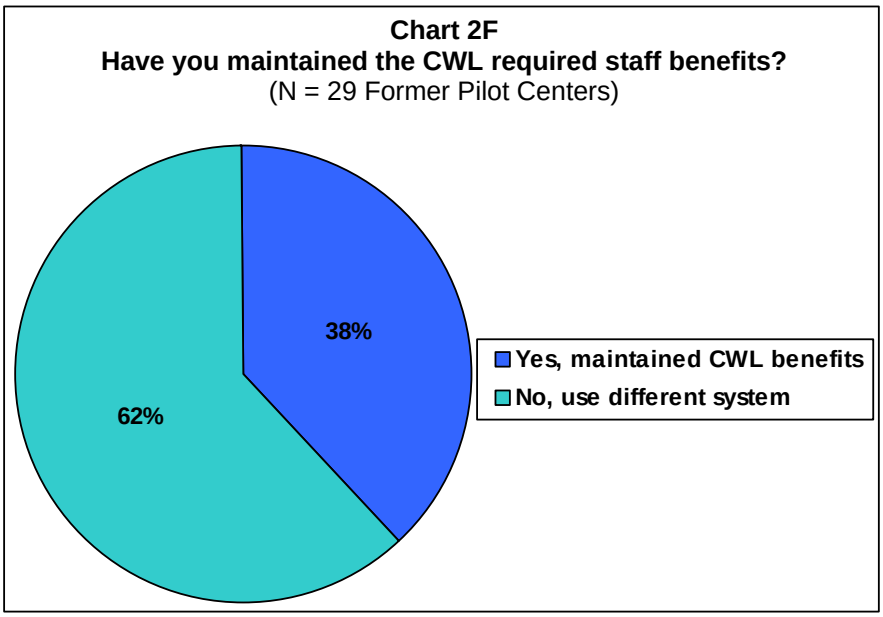


Findings: Staff Benefits

CWL centers were required to provide minimum specified health and leave day staff benefits. Centers paid for these benefits without subsidy from the state. The state paid a 15% administrative fee to participating centers (15% of their total wage supplement received from DSHS). Some centers chose to use their administrative funds to cover a portion of the required staff benefits. Benefits included 12 paid leave days annually (any combination of sick, vacation, and holidays) and a $25 per month per employee contribution to health insurance. When the CWL ended there were no requirements to provide benefits, nor were there administrative fees to offset their cost. When asked if they had maintained the CWL required benefits, about one-third of the centers reported having kept the CWL required benefits after the project ended, and about two-thirds reported having reduced or eliminated either or both the health or leave days benefits (see Table 2K for details and Chart 2F for a graphic depiction).

Table 2K
Have You Maintained the CWL Required Staff Benefits?
If Not, What is Center's Policy?
(N = 29 Former Pilot Centers)

	%	#
Maintained CWL required staff benefits	38%	11
No, Use different system than CWL per below	62%	18
Medical benefits reduced or eliminated	48%	14
Paid leave days reduced or eliminated	45%	13
Exceed CWL required benefits	14%	4



Findings: Parent Selection of Center

Former CWL pilot centers had made many structural changes in the year following the ending of the CWL, including increasing tuition. We asked them whether they had experienced any changes in parents' selection of their center, and if so why. Most had experienced no change (79%). If they had experienced change it was less enrollment due to parents losing their jobs as a result of the poor economy (see Table 2L for details). Of the 16 centers which had reported responding to financial strain by raising their tuition, 4 also reported reductions in parents' selection of their center.

Table 2L
Have You Experienced Reductions in Parents' Likelihood to Select Your Center? If So, Why?
(N = 29 Former Pilot Centers)

	%*	#*
No Changed in parents likelihood of selection	79%	23
Poor economy meant parents lost jobs so fewer families enrolled	17%	5
Number of educated staff dropped w/CWL end, some parents chose other centers with better educated staff	7%	2

*More than 1 response possible, greater than 100% possible

Findings: Closure of Centers or Intention to Close, Short Telephone Interviews

As stated at the start of this chapter, in December of 2004 all 124 former pilot centers, and all comparison centers which had participated in the three year study, were contacted to determine whether they were still in business. The purpose of this inquiry was to determine if the ending of the CWL had changed the pattern of center closures noted during the CWL. If a center no longer had an operational telephone number, the local DSHS DCCEL office was contacted to determine if that center had closed (see Chapter 1 for further protocol information). Staff members were asked whether their center was currently still in operation,

and whether they expected to be in operation in 2005. All centers which were currently in operation in December of 2004 expected to remain so in 2005. It is difficult to compare the findings of the former pilot and comparison groups, because whereas during the CWL we were informed by DSHS of any pilot center closures or name changes, when similar changes occurred with comparison centers, they simply stopped returning surveys, and we often were unable to identify whether they were still in existence under a different name. The more representative comparison is between pilot center closures during the CWL and in the year subsequent.

The data reported on Table 2M shows that pilot and comparison centers had similar closure rates in the year after the ending of the CWL (6% and 5%). However, comparing the closure rate of pilot centers during and after the CWL reveals that in the three years of the CWL 8 former pilot centers closed (6% of the total), and in the one year following the CWL 7 centers closed (6% of the total). Most of the individuals interviewed regarding post CWL closures volunteered that their center had closed because of financial difficulties due to the ending of the CWL funds. One center noted that they did not have funds to continue the CWL wage rates, and the director felt it was "immoral" to lower her employees' wages or hire only minimum wage staff, and so she reluctantly closed her business. This increase in the rate of closure for former pilot centers is an illustration of the financial duress that some former CWL centers experienced in the year following the ending of the project (see Table 2M for details).

Table 2M
Center Closures

	Closed During CWL *3 year period*		**Closed After CWL End** *1 year period*		**Status Unknown**		**Still in Operation 1/2005**		**Total # of Centers**
	#	**% of total**	**#**	**% of total**	**#**	**% of total**	**#**	**% of total**	
Former Pilot Centers	8	6%	7	6%	0		109	88%	124
Comparison Centers	11	9%	6	5%	35	28%	74	59%	126

Summary

In summary, most former pilot centers reported experiencing financial strain resulting from the ending of the CWL. In response, they made numerous structural changes in their policies from the policies required during the CWL. Common changes included:

- Collapsing the CWL required management positions into one position (41% of centers)
- Reducing the total number of staff (36%)
- Reducing wages below those of the CWL for all employees or for new hires (58%)
- Reducing the CWL required entry salaries by position (66%)
- Reducing or eliminating the CWL required increases per educational step (97%)
- Reducing or eliminating the CWL required $.25/hour annual retention raises (62%)
- Reducing or eliminating the required CWL medical benefits or 12 paid leave days (48%)
- Increasing tuition (77%).

As a result of these changes, some centers reported having attracted less educated (54%), and less experienced (38%) job applicants. Few reported a reduction in parents' selection of their center. Finally, another marker of financial strain was the fact that almost the same

number of former pilot centers closed in the 12 months after the ending of the CWL (7 centers) as had closed in the 3 years during the CWL (8 centers).

CHAPTER 3
RESULTS: MAIL SURVEY

WAGES AND WAGE CHANGES

Introduction

A goal of the Washington Career and Wage Ladder Pilot Project was to improve the wages of child care workers. As a requirement for participation in the project, all pilot child care centers contracted with DSHS to pay their eligible employees in accordance with the Washington Child Care Career and Wage Ladder scale. All early childhood care givers working at least 20 hours per week, and all school age care givers working at least 15 hours per week were required to be paid on this scale (two separate scales were utilized: one for King County and another for the remainder of the state at lower rates than King County).

The prescribed scale provided required minimums and increases based on employees' level of responsibility (position), years of experience, and level of education. Wages increased by a minimum $.50/hour per level of responsibility, $.25/hour for each year of experience (at that center), and originally $.50/hour per educational step. In the last 2 years of the pilot, additional educational steps were added to the Ladder, which led to less than $.50/hour increases for some educational steps. Three increases in state minimum wages occurred during the project, necessitating increases in the pilot wage amounts from the original requirements (see Appendix for scales).

Centers paid the wage increments for level of position. DSHS paid increments of $.50/hour for educational levels beyond those required in the Washington Administrative Code (WAC) for that position. Centers paid the $.25/hour experience wage increments. DSHS paid a portion of the experience increments, if the center had DSHS subsidized children in 25% or more of the center's licensed child care slots.

With the ending of the Career and Wage Ladder Pilot Project on June 30 2003, the requirements no longer existed, nor did the payments from DSHS if employees reached the previously identified milestones. The results below illustrate the changes that occurred in wages over the course of the pilot, compared with the change that occurred between the end of the pilot (June 2003) and the following May (2004, one year later) in both the pilot and comparison groups overall and for specific employees.

RESULTS: HOURLY WAGES

As throughout this report, the wage analyses describe the results for the employees at centers which completed all nine waves of data collected over the three years of the pilot and the fourth year, the "Post-CWL year" (137 total centers, 69 pilot and 68 comparison). This represents 3,575 employees over all nine waves. Since employees are not accounted for in each wave (data may be missing or they may have not yet been hired or have left their position), the number of employees for each particular wave will vary.

Table 3A presents the average hourly wage reported by centers in the pilot and comparison groups based on all reported employees' wages in May of 2001, 2002, 2003, and 2004. Wages were consistently less for the comparison group, and more for the pilot group. Each year the differences between the group averages were statistically significant.

Because the range of hourly wage is wide, to understand what a typical employee earns, the median and mode wages are also reported for each time period. The median is the mid point wage, with half of the employees earning above this wage and half below it. The mode represents the most commonly received wage. For both the median and mode, as with the average wage (mean), the pilot hourly wage is always higher.

These wage statistics illustrate a pattern with two salient features:

- The pilot employees make more at each point in time (the difference is statistically significant at quite a high level).
- Both groups of employees showed increases at each point in time **except** in the case of the pilot group in May of 2004. At almost one year after the end of the pilot project and its attendant funding, **for the first time since the beginning of the pilot project, average wages decreased in pilot centers. This decrease did not occur in the comparison group.**

Table 3A
Average Hourly Wage
2001-2004

Approximate date of wage report	Pilot	Comparison	Significance of difference between groups (T-Test**)
May 2001	$9.19 N = 768 Range: $6.72–$23.75 Median: $8.75 Mode: $8.00	$8.38 N = 674 Range: $6.72–$28.94 Median: $7.75 Mode: $7.00	***p= <.0001***
May 2002	$9.51 N = 845 Range: $6.90–$24.27 Median: $8.95 Mode: $8.45	$8.59 N = 721 Range: $6.90–$23.00 Median: $8.00 Mode: $7.00	***p= <.0001***
May 2003	$9.73 N = 855 Range: $7.01-$25.00 Median: $9.00 Mode: $8.70	$8.81 N = 742 Range: $7.01–$23.33 Median: $8.00 Mode: $8.00	***p= <.0001***
May 2004	$9.67 N = 749 Range: $7.16–$25.00 Median: $9.00 Mode: $8.00	$9.10 N = 681 Range: $7.16-$25.00 Median: $8.25 Mode: $7.50	***p= <.0001***

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

**If differences statistically significant (.05 or smaller), significance noted in bold/italic

The results in Table 3A reflect averages computed for all employees with wages reported at that data point. Comparing average wage down the columns gives an idea of the average amount of wage change overtime for all employees. Conversely, Table 3B reports on the average wage change when matching employee wage at the two data points. Some of these employees were in the same position one year later; others had been promoted. The number of employees presented in each cell is smaller than in Table 3A because the

number of employees present at two waves is smaller than the total number of employees reported in any one wave. When examined in this manner, the data indicate that wage increased more for pilot employees in the first two contrasts, but that comparison employees, nonetheless, did show statistically significant wage increases in each year. The striking result in Table 3B is the lack of change in wage for the former pilot employees in the year following the end of the pilot project. Former pilot employees present in May 2003 and 2004 saw a 1 cent decrease in wage, though this difference is not statistically significant, while former comparison group employees experienced a statistically significant $.38 per hour wage increase over the same period.

Table 3B
Average Wage Change (1 year periods)
Comparing specific employees present at both waves

Comparison Years	Difference in Average Pilot Wage	Difference in Average Comparison Wage
May 2001–2002	$.62* N = 497	$.43* N = 415
May 2002–2003	$.45* N = 551	$.27* N = 453
May 2003–2004	-$.01 N = 527	$.38* N = 452

*indicates the difference was statistically significant at the .0001 level (not due to chance)

Wage by Position

Table 3C summarizes data regarding average wage for each position at the end of the pilot project (May 2003) and the end of the post-CWL year (May 2004). Examining wages by job title reveals a complex pattern with several main features:

- **The wage increase with increased responsibility continued to be evident in the post-CWL year.** The wage "ladder" still seems to be operational even after the loss of the funding. It would take more time observing this wage progression to see if it remains in place without the subsidy.
- **Average wage of former pilot employees remained higher than the comparison employees in the post-CWL year, though these differences were not always statistically significant.** Only in aide and lead teacher positions did the wage difference remain large enough to be statistically significant.
- **The amount of increase between "rungs" on the ladder decreased from 2003 to 2004 in the former pilot group and increased from 2003 to 2004 in the former comparison group.** For example, in May 2003, the wage increase between aide and lead teacher in the pilot group was $1.34 while it was $.75 in the comparison group. In 2004 in the former pilot group, the difference in wage for these two positions was only $1.17 while it went up to $.97 in the comparison group. There is an exception to this rule—the increase from teacher to site coordinators in the comparison group did not increase. However, because the increase was so unusually high in the first year, it is not surprising that it did not increase. In fact, it seemed to have returned to a more reasonable increase. It is important to note this pattern excluding this one exception. What is apparent here is a trend of decreasing wage steps as employees move up the "ladder" in the pilot group, while at the same time, an opposite upward trend of larger wage steps with increased responsibility in the comparison group.

Table 3C Average Hourly Wage by Position–May 2001 through May 2004				
Year	**May 2001**	**May 2002**	**May 2003**	**May 2004**
	Aide/Assistant			
Pilot	**$8.06** N = 309 Range $6.72–$12.62 Median $7.92 Mode $7.50	**$8.41** N = 347 Range $6.90–$15.00 Median $8.20 Mode $7.20	**$8.49** N = 329 Range $7.01–$18.00 Median $8.20 Mode $7.70	**$8.49** N = 235 Range $7.16–$15.00 Median $8.20 Mode $7.20
Comparison	**$7.45** N = 223 Range $6.72–$10.50 Median $7.00 Mode $6.72	**$7.55** N = 276 Range $6.90–$14.25 Median $7.25 Mode $7.00	**$7.85** N = 247 Range $7.01–$14.76 Median $7.50 Mode $7.01	**$7.93** N = 213 Range $7.16–$13.50 Median $7.50 Mode $7.16
Sig. of diff. **	***p*= <.0001**	***p*= <*.0001***	***p*= <*.0001***	***p*= <.0001**
	Lead Teacher			
Pilot	**$9.46** N = 352 Range $6.75–$18.80 Median $9.00 Mode $8.50	**$9.63** N = 405 Range $7.00–$19.45 Median $9.23 Mode $8.70	**$9.84** N = 422 Range $7.20–$19.45 Median $9.45 Mode $8.70	**$9.66** N = 404 Range $7.16–$20.00 Median $9.22 Mode $8.00
Comparison	**$8.12** N = 332 Range $6.72–$13.75 Median $7.88 Mode $7.00	**$8.51** N = 326 Range $6.90–$14.50 Median $8.03 Mode $8.00	**$8.60** N = 370 Range $7.01–$17.27 Median $8.00 Mode $8.00	**$8.90** N = 338 Range $7.16–$17.79 Median $8.41 Mode $7.50
Sig. of diff. **	***p*= <*.0001***	***p*= <.0001**	***p*= <.0001**	***p*= <.0001**
	Site Coordinator			
Pilot	**$12.06** N = 19 Range $7.40–$15.50 Median $11.75 Mode $11.50	**$11.85** N = 17 Range $8.30–$15.00 Median $11.50 Mode $15.00	**$11.36** N = 16 Range $9.20–$14.60 Median $11.52 Mode $12.25	**$10.45** N = 14 Range $8.00–$15.10 Median $9.75 Mode $9.00
Comparison	**$9.44** N = 13 Range $8.00–$12.41 Median $8.61 Mode $8.00	**$9.03** N = 10 Range $7.48–$12.36 Median $8.80 Mode $8.50	**$9.74** N = 13 Range $7.10–$13.00 Median $9.10 Mode $9.10	**$10.92** N = 9 Range $7.85–$16.13 Median $10.00 Mode $9.10
Sig. of diff. **	***p*=.0003**	***p*=.0009**	***p*=.0209**	*p*=.6532
	Program Supervisor			
Pilot	**$11.78** N = 40 Range $7.50–$19.69 Median $11.49 Mode $9.50	**$12.36** N = 34 Range $9.95–$18.71 Median $12.10 Mode $11.95	**$12.26** N = 39 Range $9.95–$18.00 Median $11.95 Mode $10.70	**$12.27** N = 26 Range $8.95–$21.00 Median $11.73 Mode $11.00
Comparison	**$11.05** N = 54 Range $7.00–$28.94 Median $10.00 Mode $8.75	**$11.61** N = 29 Range $7.75–$20.83 Median $11.00 Mode $9.00	**$11.57** N = 29 Range $7.25–$20.00 Median $11.00 Mode $10.00	**$11.58** N = 24 Range $8.30–$17.00 Median $10.70 Mode $15.00
Sig. of diff. **	*p*=.3782	*p*=.2103	*p*=.2284	*p*=.3673
	Director			
Pilot	**$13.35** N = 25 Range $9.00–$23.75 Median $12.50 Mode $11.00	**$14.92** N = 36 Range $10.50–$24.27 Median $14.23 Mode $10.50	**$14.77** N = 35 Range $8.86–$25.00 Median $13.41 Mode $12.00	**$13.43** N = 48 Range $8.50–$25.00 Median $12.63 Mode $12.00
Comparison	**$11.87** N = 54 Range $6.72–$22.98 Median $11.25 Mode $10.00	**$12.27** N = 59 Range $7.00–$23.00 Median $11.50 Mode $12.00	**$12.07** N = 63 Range $7.75–$23.33 Median $11.49 Mode $9.00	**$12.51** N = 59 Range $7.36–$25.00 Median $11.50 Mode $9.00
Sig. of diff. **	*p*=.1076	***p*=.0009**	***p*=.0005**	*p*=.1936

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

**If differences statistically significant (.05 or smaller), significance noted in bold/italic

As with the average wage across positions, it is instructive to not only look at all employees reported in a single wave, but to compare actual employees' wage change from one time to the next to see what change the end of the pilot project resulted in. Table 3D does this by presenting the average change in wage for assistants, teachers, and so on from May 2003 to May 2004. It is important to remember that employees must have remained in the same level of position in order to be included in this analysis. This table makes clear that:

- None of the changes for the pilot group employees were statistically significant, indicating that in general wages remained the same for employees who were in a particular position at the end of the pilot and remained there for the year following the end of the pilot.
- In contrast, the comparison group wages increased at a statistically significant level for aides/assistants, lead teachers, and directors. The increase for program supervisors was substantial, but not statistically significant, probably due to the small number of employees in that group.

Table 3D
Average Wage Change May 2003–2004
Comparing Specific Employees Present at Both Waves
In Same Position at Both Waves

Position	Pilot	Comparison
Aide/Assistants	$.07 N = 173	$.38** N = 131
Lead Teachers	$.03 N = 251	$.40** N = 203
Site Coordinator	$.13 N = 5	$.25 N = 3
Program Supervisor	$.19 N = 17	$.02 N = 18
Director/Ass't. Director/Owner	-$.17 N = 23	$.78 ** N = 45

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
**If differences statistically significant (.05 or smaller), significance noted in bold/italic

Wages of employees that stayed for one year. Table 3E summarizes the amount of wage change for employees who remained employed from May of one year to May of the next. This analysis was completed for three years: the second and third years of the pilot project, and the post CWL year. This analysis compares the wage for specific employees at the beginning of the period and the end of the period. So, for example, regardless of when they were hired, an employee who was employed at May of 2001 and still employed in May of 2002 was included in the first row of analysis. Examination of these mean wages show that wage increases were higher for former pilot than comparison employees, **except in the post-CWL year,** during which those in the former pilot centers who stayed saw no increase in wage, while their counterparts in comparison centers saw a $.41 increase per hour in the post-CWL year. Clearly, the wages of former pilot employees reached a plateau in the post-CWL year, while the comparison center employees continued to see an increase in wage.

Table 3E Average Wage Change Over One Year For Employees Present from May to May of Year		
	Wage Change	
Year Employees Stayed	**Pilot**	**Comparison**
2001-02 (2nd CWL year)	$.67 ***p=<.0001***** N = 431	$.42 ***p=<.0001***** N = 364
2002-03 (Last CWL year)	$.42 ***p=<.0001***** N = 323	$.20 ***p=.0037***** N = 265
2003-04 (Post CWL year)	$.01 p=.9079 N = 439	$.41 ***p=<.0001***** N = 367

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
**If differences statistically significant (.05 or smaller), significance noted in bold/italic

Difference in wages paid to new employees in the CWL and Post-CWL year. The results of the 2004 telephone survey suggested that former pilot center directors coped with the loss of the CWL funding by hiring new employees at a lower wage, while maintaining the higher CWL wage for remaining employees (see Chapter 2 for details). To assess whether the loss of the CWL funding influenced the wage of new hires, we examined the mean wage of employees hired at the beginning of the last year of the CWL (July through October 2003) and those hired at the beginning of the post-CWL year (July through October 2004). The mean wage for new hires in former pilot centers was $8.49 in May of 2003. New hires were paid, on average, $8.48 in May of 2004. While these wages look very similar, they are statistically, significantly different p=<.0001. The statistical significance may have to do with the difference in range in the two years' wages. The wage in the Fall of 2003 ranged from $6.90 to $17.21. In the fall of 2004, the range was quite decreased with wages from $7.01 to 11.67 reported. It might seem possible to explain this difference by the position of employee hired, but in fact, the new hires in 2003 were much more likely to be assistants (58% vs. 36% lead teachers) while in 2004, they were much more likely to be lead teachers (53% vs. 44% assistants). So, in the fall of 2004, more lead teachers were being hired and with a range of wages much lower than the previous year, the last year of the CWL, providing slightly different evidence of the decrease in wages at former pilot centers following the loss of the CWL funding.

Summary

Examination of wages and patterns of wage increases and decreases over the years May 2002–May 2004 show that the loss of the CWL funding has resulted in the reversal of the pattern apparent during the CWL. That is, during the CWL, the pilot employees' wages were higher than comparison employees and were increasing at a faster rate than the comparison center employees. Post-CWL funding, comparison center employees are showing greater increases in wage than the former pilot center employees.

CHAPTER 4
RESULTS: MAIL SURVEY

EMPLOYEE BENEFITS

Introduction

A goal of the Washington Child Care Career and Wage Ladder Pilot Project (CWL) was to improve the staff benefits of child care workers. As a requirement for participation in the project, all CWL pilot centers contracted to provide certain employee benefits, including the following:

1. A minimum of 10 days (increased to 12 days after the first year) total paid leave per year (combination of sick, vacation, holiday, and/or personal leave days);

2. Payment of each ladder eligible employee's full monthly health insurance premium, if less than or equal to $25 per month. If an employee's monthly health premium was greater than $25, pilot centers were required to pay a minimum of $25 per month per employee.

CWL centers had six months to fully implement the employee benefits requirements; however, pilot centers did not receive funds from the Career and Wage Ladder project to provide these benefits. Pilot centers did receive an Administrative Fee from DSHS to cover all administrative costs they incurred due to pilot participation. The Administrative Fee equaled 15% of each center's total yearly Career and Wage Ladder wage enhancement. Thus, if a center received $10,000 in wage enhancements, they received $1,500 in administrative fees. Pilot centers were permitted to use dollars from the 15% administrative fee to pay for staff benefits.

During the CWL project, considerably more pilot centers than comparison centers offered the benefits required of the pilot, as well as additional benefits. Further, in many cases these benefits had not been offered prior to pilot implementation.

With the ending of the Career and Wage Ladder Pilot Project in June 2003, the benefit requirements no longer existed, nor did the Administrative Fee payment from DSHS. This chapter will summarize the changes that occurred in benefits offered to employees in the year following the ending of the CWL. Benefit findings are examined in two ways: (1) comparing results during the last year of the CWL and the first year of the post CWL for the former pilot group, and (2) comparing the pilot and comparison groups.

Data Collection Methods

During the CWL in six of the seven waves of mail survey data collection, respondents (pilot and comparison center directors) were asked to report the employee benefits they provided to their child care staff. They reported both benefits required of centers participating in the pilot, and other benefits, not required for pilot participation. In the year following the ending of the CWL (identified as the Post CWL Year in the tables provided throughout this report), former pilot and comparison center respondents completed two additional mail surveys in which they were asked the same series of questions regarding benefits that they had completed during the CWL.

EMPLOYEE BENEFITS: RESULTS OF THE POST CWL STUDY

Results for Benefits Previously Required for CWL Participation

Table 4A compares the benefits provided by pilot and comparison centers, for all benefits that had been required for participation in the pilot project (minimum 12 days of paid sick, holiday, and/or vacation days; and $25 per month contribution to each employee's health insurance premium). The table contrasts the percentage of pilot and comparison centers offering each benefit by the end of the CWL period, May 2003 (identified as Time Period, During CWL), and by the end of the year following the completion of the CWL, May 2004 (identified as Time Period, Post CWL). Table 4A also indicates whether the difference between the percentage of pilot and comparison centers offering a particular benefit is statistically significant; and whether the pilot group differences between the CWL and post CWL year are statistically significant.

In the Post CWL year there were dramatic reductions in percentages of pilot centers offering staff benefits required for CWL participation. By the last months of the CWL a considerably higher percentage of pilot centers offered each of the required benefits than did comparison centers (all differences between groups were statistically significant). For instance, during the CWL 88% of pilot and 44% of comparison centers offered the health benefit. The story had dramatically changed by the end of the year following the CWL.

Analyzing the findings, for every required benefit a considerably lower percentage of pilot centers offered a benefit than during the CWL. In three of the four cases these differences were statistically significant. Alternatively, about the same percentage of comparison centers offered each benefit at the end of the CWL and at the end of the post CWL year. Thus the ending of the CWL had a strong negative effect on the provision of CWL required staff benefits at former CWL centers.

It was still true that in all cases one year later a higher percentage of former pilot centers were offering each benefit than comparison centers were. However, the difference between the groups had narrowed so much that only one (health insurance) remained statistically significant. Thus only 59% of pilot centers offered health benefits one year after the CWL ended (88% had during the CWL), whereas 43% of comparison offered the benefit post CWL (44% had done so during the CWL. See Chart 4A for a graphic illustration of the changes in percentages of benefits offered by pilot centers during and after the CWL. In contrast, see Chart 4B for an illustration of the very similar percentages comparison centers offered during and after the CWL.

Table 4A: Employee Benefits Provided Benefits ***Required*** for CWL Participation During the CWL and POST CWL				
Benefit	**Time Period**	**Percentage (#) Report Offer Benefit** **Pilot**	**Comparison**	**Significance of Chi Square** Compare P & C**
Paid Sick Days	During CWL Post CWL	77% (53) 61% (42)	59% (40) 56% (38)	CWL ***p=.0242*** Post p=.5538
Significance of Chi Square** Compare During/Post CWL, P & C separately		***p=.0432***	p=.7288	
Paid holidays	During CWL Post CWL	90% (62) 81% (56)	71% (48) 69% (47)	CWL ***p=.0046*** Post p=1028
Significance of Chi Square** Compare During/Post CWL, P & C separately		p=.1468	p=.8518	
Paid vacation days	During CWL Post CWL	94% (65) 81% (56)	78% (53) 78% (52)	CWL ***p=.0059*** Post p=.6090
Significance of Chi Square** Compare During/Post CWL, P & C separately		***p=.0197***	p=.9633	
Health insurance	During CWL Post CWL	88% (61) 59% (41)	44% (30) 43% (29)	CWL ***p=<.0001*** Post ***p=.0496***
Significance of Chi Square** Compare During/Post CWL, P & C separately		***p=.0001***	p=.8626	

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

**If differences statistically significant (.05 or smaller), significance noted in bold/italic

Chart 4A
Benefits Required for CWL Participation
PILOT CENTERS ONLY
Contrasting During CWL (May 2003) and POST CWL (May 2004)
Differences significant (except for Holidays)

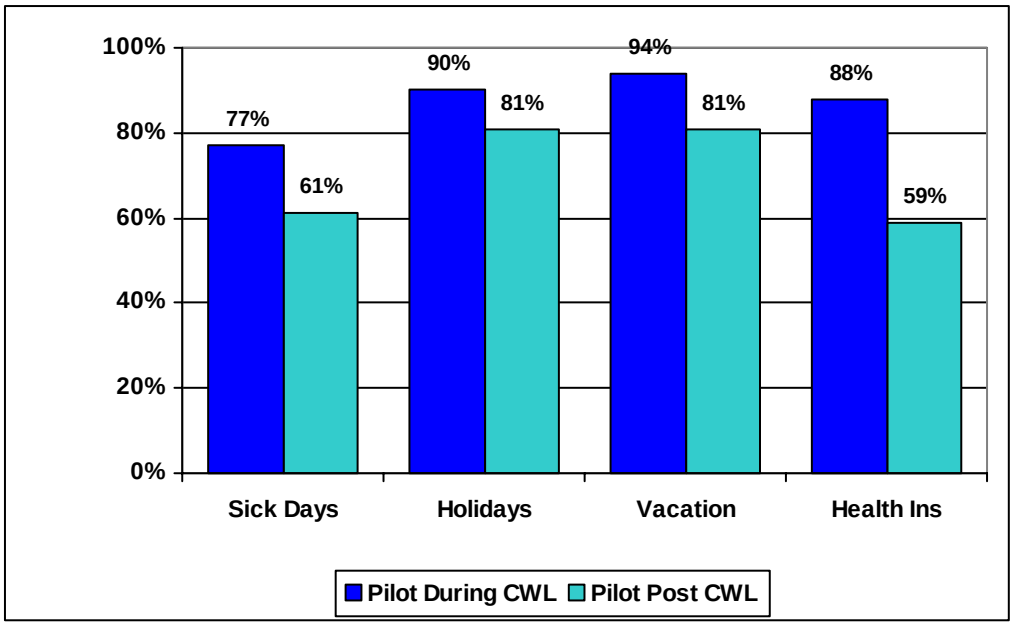
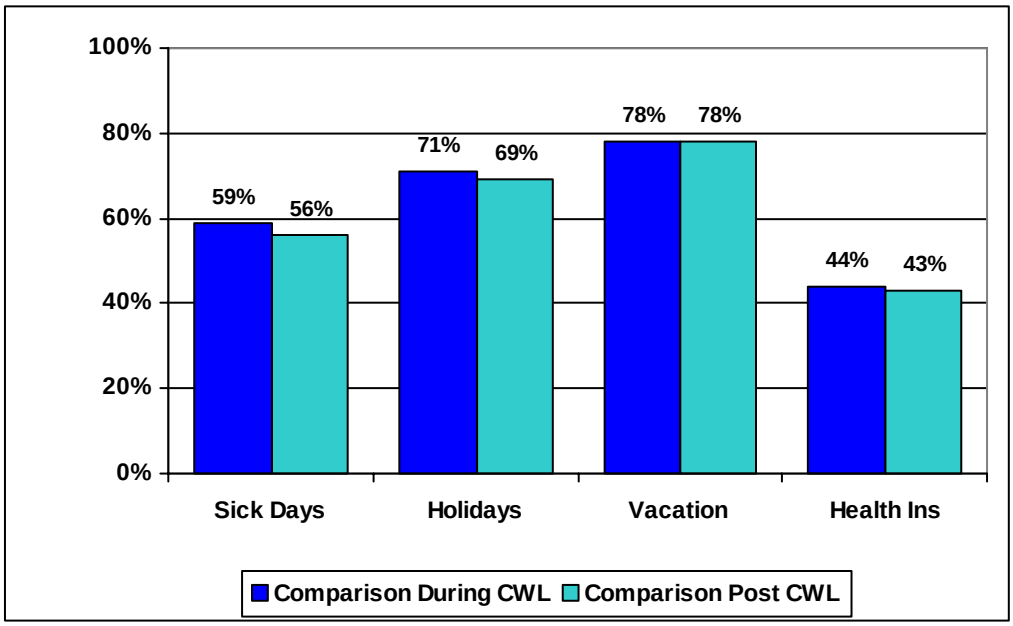


Chart 4B
Required for CWL Participation
COMPARISON CENTERS ONLY
Contrasting During CWL (May 2003) and POST CWL (May 2004)
NO differences significant



Benefits Not Required of Washington Child Care Career and Wage Ladder Centers
Table 4B compares pilot and comparison centers on provision of employee benefits not required for pilot participation (7 benefits were reported, such as paid education or training fees, released time for training, reduced child care fees, etc.). The table contrasts the percentage of pilot and comparison centers offering each benefit by the end of the CWL period, May 2003 (identified as Time Period, During CWL), and by the end of the year following the completion of the CWL, May 2004 (identified as Time Period, Post CWL). Table 4B also indicates whether the difference between the percentage of pilot and comparison centers offering a particular benefit is statistically significant.

During the CWL for two benefits the difference between the groups was significant: paid education fees/tuition and provision of compensation or overtime pay. In both of these cases pilot centers were more likely to provide the benefit. **By the end of the post CWL year only the provision of compensation or overtime pay was more likely to be provided by pilot than comparison centers. Further, in every case the percentage of pilot centers offering a particular benefit was less than that percentage during the CWL. Thus with the ending of the CWL former pilot centers reduced the benefits provided to staff.**

Table 4B
Employee Benefits Provided During the CWL and POST CWL
Benefits provided, but *provision not required* for CWL participation

Benefit	Time Period	Pilot Offer Benefit		Comparison Offer Benefit		Significance of Chi Square**
		%	#	%	#	
Paid maternity /paternity leave	During CWL	12%	9	15%	10	CWL no significant diff.
	Post CWL	9%	6	12%	8	Post no significant diff.
Retirement plan	During CWL	31%	21	24%	16	CWL no significant diff.
	Post CWL	29%	20	21%	14	Post no significant diff.
Life insurance	During CWL	11%	7	12%	8	CWL no significant diff.
	Post CWL	9%	6	15%	10	Post no significant diff.
Comp time/overtime paid	During CWL	97%	67	76%	51	**CWL *p=.0003***
	Post CWL	91%	63	74%	50	**Post *p=.0062***
Reduced child care fees	During CWL	86%	59	85%	58	CWL no significant diff.
	Post CWL	80%	55	84%	57	Post no significant diff.
Release time for training	During CWL	90%	62	79%	54	CWL no significant diff.
	Post CWL	83%	57	74%	50	Post no significant diff.
Education or tuition fees paid	During CWL	83%	57	62%	42	**CWL *p=.0064***
	Post CWL	77%	53	66%	45	Post no significant diff.

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
**If differences statistically significant (.05 or smaller), significance noted in bold/italic

Summary
In the Post CWL year there were dramatic reductions in percentages of pilot centers offering staff benefits that had been required for CWL participation (minimum 12 days of paid sick, holiday, and/or vacation days; and $25 per month contribution to each employee's health insurance premium). By the last months of the CWL a considerably higher percentage of

pilot centers offered each of the required benefits than did comparison centers (all differences between groups were statistically significant). However, by the end of the post CWL year, for every required benefit a considerably lower percentage of pilot centers offered a benefit than had during the CWL (in three of the four cases these change amounts were statistically significant). Alternatively, about the same percentage of comparison centers offered each benefit at the end of the CWL and at the end of the post CWL year. Thus the ending of the CWL had a strong negative effect on the provision of CWL required staff benefits at former CWL centers.

With the ending of the CWL there were also reductions in the percentages of former pilot centers offering additional benefits, not required for CWL participation. Thus overall the ending of the CWL resulted in many former pilot centers dramatically reducing the staff benefits provided to their staff.

CHAPTER 5
RESULTS: MAIL SURVEY

EDUCATION

Introduction
An important part of the structure of the CWL was the wage incentive to achieve higher levels of education. Aware of the accepted importance of provider education to the quality of child care, the authors of this ladder incorporated $.25-.50 raises per hour for each education step on the ladder. Thus the evaluation of the CWL focused on movement up the ladder with regard to educational attainment. In addition, we examined what we called the educational pursuit of participants; we hypothesized that full-time employees may pursue education, while not necessarily achieving increasing steps on the ladder. In this chapter we present the results related to both attainment and pursuit of education, in terms of how it changed during the post-CWL year.

Educational Attainment
During the life of the pilot project, we compared the number of employees at each educational level in the pilot and comparison groups. We referred to this as educational attainment to distinguish it from pursuit, or the education that was in progress during the pilot project. Over the course of the pilot project, educational attainment was consistently higher in the pilot than the comparison employees. This difference, however, seemed to be due to the hiring of more educated personnel by pilot centers, as increases in individual employees' educational levels were not common over the course of the pilot project and were no more likely in the pilot than the comparison employees. The same difference continued to exist in the post-CWL year. In May of 2004, 47% of the former pilot employees had at least 15 college ECE credits, while only 36% of comparison center employees did (p=<.0001).

We were also interested in changes in the number of employees in the various educational levels from the end of the pilot project through the end of the post-CWL year. In Tables 5A and 5B, the number of employees in each level at the end of each year are reported for the former pilot and comparison employees respectively. The educational levels chosen represent the educational milestones that make up the markers on the Career and Wage Ladder and are itemized separately in the left-most columns in each table. The columns to the right collapse the percentages into two categories: (1) No specialized higher education training in Early Education, and (2) ECE credits/degrees from institutions of higher education. As can be seen in both tables the percentage of employees with or without any college education is about the same in May of 2003 and May of 2004 (e.g., 2% less in 2004). As was true during the pilot project, in 2004, more employees had no college than had some college. The proportion of employees with some college credits was higher in the pilot group both during the life of the pilot and one year after it ended. The slight change in percentage from 2003 to 2004 was not statistically significant for the pilot (p=.78) or the comparison employees (p=.64).

Table 5A Educational Attainment at End of CWL Pilot Project and at End of Post-CWL Year Pilot Only								
	May 2003		May 2004		May 2003 Collapsed		May 2004 Collapsed	
Educational Level	**#**	**%**	**#**	**%**	**#**	**%**	**#**	**%**
Less than High School	16	2%	14	2%	464	55	388	53
High School/GED	89	11%	75	10%				
STARS	359	42%	299	41%				
15 credit Hours in ECE	54	6%	48	7%	383	45	344	47
30 credit hours in ECE	37	4%	38	5%				
CDA or 45 credit hours in ECE	118	14%	115	16%				
AA in Early Childhood Education	82	10%	76	10%				
135 credit hours in ECE	12	1%	10	1%				
BA in Early Childhood Education (or 180 credits)	68	8%	50	7%				
M.A./Ph.D. in ECE	12	1%	7	1%				

Table 5B Educational Attainment At End of CWL Pilot Project and At End of Post-CWL Year Comparison Only								
	May 2003		May 2004		May 2003 Collapsed		May 2004 Collapsed	
Educational Level	**#**	**%**	**#**	**%**	**#**	**%**	**#**	**%**
Less than High School	5	1%	5	1%	491	66%	430	64%
High School/GED	124	17%	115	17%				
STARS	362	49%	310	46%				
15 credit Hours in ECE	32	4%	38	6%	252	34%	245	36%
30 credit hours in ECE	34	5%	31	5%				
CDA or 45 credit hours in ECE	66	9%	58	96%				
AA in Early Childhood Education	51	7%	51	8%				
135 credit hours in ECE	4	1%	7	1%				
BA in Early Childhood Education (or 180 credits)	64	9%	58	9%				
M.A./Ph.D. in ECE	1	>1%	2	>1%				

Further analysis of educational attainment

In addition to the categorical comparison described above, we also created a numerical score that summarized educational level for a center. To do this, we assumed a hierarchy of the categories represented in Table 5A and B. That is, a score of 1 was given to the category of "Less than high school" and a score of 10 was given to M.A./Ph.D. in ECE. Thus, an individual could have a score ranging from 1 to 10. During the CWL project, this score was consistently higher in the pilot than the comparison group. When we examined the average educational score in May 2004, this score remained significantly higher in the former pilot group than the comparison group (pilot, 4.46; comparison, 4.11 ***p=.0025***), suggesting that the pattern of hiring more highly educated employees into pilot centers that existed during the pilot project's duration continued to be apparent. However, while significantly different, this difference may not be large enough to be actually meaningful in terms of a difference between one step of education and another. A score of 4.46 is about half way between 15 and 30 ECE credits while a score of 4.11 is also between these two levels on the educational scale.

We also examined the difference in the average educational attainment score from May 2003 to May 2004. We found that, again, the difference in the score was statistically significant (***p=.0001)*** but the scores are, again, both in between the 15 and 30 ECE credit mark on the educational scale set by the CWL (***m*=4.27** in May 2003 and ***m*=4.29** in May 2004). The statistical significance of this difference is more likely due to the sample size and variance of the scores than any meaningful difference in educational level.

Educational pursuits

During the life of the CWL, we examined not only educational attainment, but also how much education was pursued by the two different groups. We hypothesized that educational pursuit (educational endeavors which don't yet meet a milestone but contribute to the attainment of a milestone) would be higher in the pilot than the comparison employees. Possible educational pursuits identified included working on a CDA, attending STARS approved workshops, or enrolling in ECE credits at community colleges or universities. During the 3 years of the pilot project, pilot center employees enrolled in all 3 types of educational endeavors at a significantly higher rate than did employees in the comparison centers.

When we compared the former pilot and comparison employees on their educational pursuits in the year following the end of the pilot funding, we found that the difference in taking STARS workshops had disappeared. That is, about 82% of former pilot employees reported taking STARS workshops in that year, while 79% of the former comparison employees did so. The difference was not statistically significant. The differences in pursuit of ECE college credits and CDA work, however persisted. In the year 2003–2004, 22% of former pilot employees reported taking ECE credits, while only 14% of former comparison center employees did. This difference was statistically significant (*p*= .0001). Similarly, in the 2003–2004 year, 13% of former pilot employees reported doing CDA work, while only 9% of former comparison center employees did. This difference was statistically significant (*p*=.0415).

We were also interested in examining the degree to which educational pursuit changed (increased or decreased) in the former pilot and comparison employees after the end of the pilot project, and to answer that question we compared former pilot and comparison to themselves in year 3 of the pilot and in the post-CWL year. Tables 5C and 5D report the results for former pilot and comparison centers, respectively. For the former pilot

employees, STARS workshop enrollment decreased in the post-CWL year, while ECE enrollment increased and CDA pursuit continued at the same rate. While ECE class enrollment continued to increase, the percentage of employees involved in these educational endeavors remains small in comparison with the proportion of employees seeking STARS workshops. The former comparison center employees showed no change in the percentage of employees pursuing any of the three types of education we tracked in this project. These results indicate that the former pilot employees' pursuit of STARS workshops and early childhood credits were related to the presence of the pilot funding, while the pursuit of CDA work was not. However, the increase in ECE credits and decrease in STARS workshops seems counter intuitive. STARS hours are required, while ECE credits are not. Finally, the specific mechanism by which the ending of the CWL project would influence educational pursuit is not clear. No funds for pursuit of education were included in the pilot project's structure. Nonetheless, the presence of a change in educational pursuit after the pilot end ONLY in the former pilot centers, does suggest some relationship.

Table 5C
Educational Pursuits Year 3 of CWL and the Post-CWL Year
Former Pilot Only

Type of pursuit	Fall and Spring 2003		Fall and Spring 2004		Significance of chi square**
	#	%	#	%	
STARS	693	86%	572	82%	***p=.02***
ECE	155	18%	141	22%	***p=.05***
CDA	98	11%	79	13%	p=.53

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Table 5D
Educational Pursuits Year 3 of CWL and the Post-CWL Year
Comparison Only

Type of pursuit	Fall and Spring 2003		Fall and Spring 2004		Significance of chi square**
	#	%	#	%	
STARS	597	81%	531	79%	p=.41
ECE	100	12%	81	14%	p=.56
CDA	63	8%	53	9%	p=.47

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Arrangements for Educational Pursuit

During the pilot duration, we tracked how educational pursuit was supported. That is, we asked if time off was given to take courses or attend workshops, if fees were reimbursed.

Time off. Tables 5E and 5F report the percentage of former pilot and comparison employees that were reported to have received time off for educational pursuits. It should

be noted that time off might be given with or without pay. For both groups, two of three types of educational pursuit showed significant changes in time off. However, they were not the same two in both groups. In the former pilot group, the change in time off to take ECE courses was not significant. Time off for STARS workshops increased significantly and time off for CDA work decreased significantly. In the former comparison centers, time off for ECE courses significantly increased, significantly decreased for CDA and stayed the same for STARS workshops. This analysis suggests that the presence of the CWL project may not have been the only factor in determining if employees were given time off for work to pursue educational endeavors. The licensing requirement for STARS 10 hour continuing education and the availability of TEACH funding may have been factors.

Table 5E
Comparison of Time Off Provided for Educational Pursuits
Pilot Only

Time Off?	ECE		STARS		CDA	
	Fall & Spring 2003	**Fall & Spring 2004**	**Fall & Spring 2003**	**Fall & Spring 2004**	**Fall & Spring 2003**	**Fall & Spring 2004**
Yes (#, %)	86 (89%)	83 (92%)	372 (74%)	352 (83%)	57 (84%)	30 (63%)
No (#, %)	11 (11%)	7 (8%)	130 (26%)	72 (17%)	11 (16%)	18 (38%)
Significance of chi-square	p=.41**		***p=.00***		***p=.01***	

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italics

Table 5F
Comparison of Time Off Provided for Educational Pursuits
Comparison Only

Time Off?	ECE		STARS		CDA	
	Fall & Spring 2003	**Fall & Spring 2004**	**Fall & Spring 2003**	**Fall & Spring 2004**	**Fall & Spring 2003**	**Fall & Spring 2004**
Yes (#, %)	41 (70%)	42 (89%)	224 (60%)	214 (64%)	33 (69%)	9 (39%)
No (#, %)	18 (31%)	5 (11%)	147 (40%)	119 (36%)	15 (31%)	14 (61%)
Significance of chi-square	***p=.01***		p=.29**		***p=.02***	

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Tuition paid. During the course of the pilot project, we examined how tuition or fees for an educational activity was paid: by the employee, center or other sources, including TEACH or STARS scholarships. The pattern of payment sources was very complex across the six times at which we collected this data. However, a general pattern did emerge which showed that pilot center employees were more likely to utilize other sources (such as

TEACH scholarships) to pay for their tuition, while comparison group employees tended to pay for credits themselves or received assistance from their centers to pay for tuition. Comparison center employees were more likely to pay for their own STARS workshops while pilot center employees' fees were paid by their centers. There were no differences in the sources of payment for CDA fees.

We compared the sources of tuition and fees in the Fall of 2003 and 2004 and the Spring of 2003 and 2004 (see Tables 5G & 5H) to compensate for any seasonal sources of funding or educational offerings (local conferences, etc.). We will discuss the pattern for former pilot employees and comparison employees separately.

Former Pilot Centers

ECE payment. Again, there was a significant change in the pattern of payment from Fall 2003 to Fall 2004, but not for the Spring of 2003 to 2004. Examining the change from Fall 2003 to Fall 2004 showed that a smaller percentage of employees paid for their own ECE credits, while the percentage of centers paying for tuition increased.

STARS payment. Sources of payment for STARS workshops were highly different from fall to fall and spring to spring. The pattern here shows that from fall to fall, a decreasing percentage of employees paid for their workshops, and centers were increasingly likely to pay. The spring to spring pattern shows an opposite pattern with the percentage of employees that paid for their own workshops increasing, while centers were much less likely to pay for workshops.

CDA payment. There was a significant change in the pattern of payment from Fall 2003 to Fall 2004, but not for the Spring of 2003 to 2004. The pattern indicates that from the Fall of 2003 to the Fall of 2004, a decreasing percentage of employees paid for their own work, with an increasing number of centers and other sources paying this fee.

Former Comparison Centers

ECE payment. This group of employees showed the opposite pattern from that of the former pilot employees. Here there was a significant change in the pattern in the Spring of 2003 to 2004, but not in the fall. Examining the change from Spring 2003 to Spring 2004 showed that a larger percentage of employees paid for their own ECE credits in 2004, while the percentage of centers paying for tuition decreased.

STARS payment. Sources of payment for STARS workshops were only significantly different from Spring to Spring. The pattern here shows that from 2003 to 2004, a decreasing percentage of employees paid for their workshops, and other sources of payment were increasingly relied upon.

CDA payment. There was a significant change in the pattern of payment from Fall 2003 to Fall 2004, and for the Spring of 2003 to 2004. The pattern indicates that from the Fall of 2003 to the Fall of 2004, a decreasing percentage of employees paid for their own work, with an increasing reliance on other sources to pay this fee.

The variety of patterns of change make this data difficult to summarize in any meaningful way. There seem to be changes in both the former pilot and comparison centers regarding

how payment of education tuition and fees occurred, suggesting that the ending of the CWL was not a direct cause of the changes.

Summary

Examining the data depicting the attainment and pursuit of education in the year following the end of the CWL pilot project suggests that the former pilot group continued to maintain its slight advantage in terms of educational level of employees. It is important however to remember how low this level of education is (usually less than an AA degree). This finding fits well with what was recounted by directors during telephone surveys. Employees who were employed before the end of the pilot project were maintained without wage decreases as often as was feasible. With no loss in wage, these employees had little reason to leave and thus the educational change that occurred in the pilot group during the CWL was maintained.

Changes in educational pursuit are more difficult to summarize, and no clear pattern of change in pursuit and whether time off was given or fees paid. This is not surprising, given that funds for educational endeavors were not part of the subsidy paid by DSHS. The funds that employees accessed to pursue education remained in place following the end of the pilot project.

Table 5G
Source of Tuition Payment for Educational Pursuits
Former Pilot Only

Payment Source	ECE				STARS				CDA			
Time point	Fall 2003	Fall 2004	Spring 2003	Spring 2004	Fall 2003	Fall 2004	Spring 2003	Spring 2004	Fall 2003	Fall 2004	Spring 2003	Spring 2004
Employee Paid all or part	41 44%	17 20%	38 34%	23 29%	112 30%	48 16%	65 13%	106 27%	31 49%	5 10%	18 30%	16 37%
Center Paid all or part	15 16%	29 34%	23 21%	14 18%	198 53%	194 65%	322 64%	175 44%	17 27%	25 48%	19 32%	12 28%
Other	37 40%	40 47%	51 46%	41 53%	66 18%	56 19%	117 23%	119 30%	15 24%	22 42%	23 38%	15 35%
Significance of chi-square**	***p=.0008***		*p*=.6346		***p=.0001***		***p=.0000***		***p=.0000***		*p*=.7435	

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
**If differences statistically significant (.05 or smaller), significance noted in bold/italic

Table 5H
Source of Tuition Payment for Educational Pursuits
Former Comparison Only

Payment Source	ECE				STARS				CDA			
Time point	Fall 2003	Fall 2004	Spring 2003	Spring 2004	Fall 2003	Fall 2004	Spring 2003	Spring 2004	Fall 2003	Fall 2004	Spring 2003	Spring 2004
Employee Paid all or part	27 41%	21 43%	26 41%	34 67%	55 18%	49 18%	110 26%	65 16%	13 41%	4 17%	11 42%	3 25%
Center Paid all or part	24 36%	17 35%	25 39%	7 14%	184 61%	171 63%	196 46%	202 49%	10 31%	6 25%	3 12%	7 58%
Other	15 23%	11 22%	13 20%	10 20%	63 21%	53 19%	117 28%	149 36%	9 28%	14 58%	12 46%	2 17%
Significance of chi-square**	*p*=.9760		***p=.0060***		*p*=.8948		***p=.0004***		***p=.0543***		***p=.0089***	

**p=level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
**If differences statistically significant (.05 or smaller), significance noted in bold/italic

CHAPTER 6
RESULTS: MAIL SURVEY

EMPLOYEE RETENTION

Introduction

As throughout this report, the focus of this chapter will be to summarize the findings regarding how pilot centers fared after the completion of the Washington Child Care Career and Wage Ladder Pilot Project (CWL). Specifically, this chapter will describe the post CWL findings regarding retention. To put the post CWL data in context, first the retention findings of the three years of the pilot will be briefly summarized. Then the findings of the post CWL year will be described. The post CWL evaluation study lasted for one year, and the full CWL pilot lasted for three years. Therefore, in many cases, in order to be comparing "apples to apples" (one year findings to one year findings) analyses will compare the findings of the last year of the CWL with the findings of the first year after the CWL. Data will be provided comparing retention rates: overall, based on employee job title, based on length of employ (short term, mid, and long term), based on employee education, and based on wage.

Findings During the Three-Year Child Care Career and Wage Ladder Pilot Project (CWL)

One of the goals of the Career and Wage Ladder (CWL) was to increase the retention of child care center staff. A premise of the CWL was that increased staff retention would improve the stability of care for children, and reduce center disruption, thereby improving quality of care. In general, the finding during the three years of the CWL was that retention was essentially the same for pilot and comparison employees. However there were exceptions to that finding based on hire dates. **The key retention findings during the three years of CWL pilot implementation are summarized as follows**.

1. Retention rates of the comparison and pilot centers were very similar in the year prior to the implementation of the CWL (pilot and comparison were well matched on retention).
2. Retention of employees present in the fall of 2000 (at the start of the CWL), and still present in May of 2003 (at the end of the CWL) was about 40% for both pilot and comparison groups. Thus when considering the entire group of employees, the CWL project did not appear to effect retention.
3. The average length of employ for both pilot and comparison employees was about 2 ½ years. Thus considering all employees, the CWL project did not appear to effect total length of employ.
4. However, there was great variation in length of employ (15% of pilot and 23% of comparison were employed for less than a year, and 17% of both groups more than 7 years, some more than 25 years).
5. The retention rates and number of months of employment of long-term employees appeared not to have been affected by the pilot project, as these were the same for the pilot and comparison groups.
6. The retention rates and total number of months of employment of recently employed staff (those hired in the first three months of the pilot) were higher for pilot employees than for comparison employees. Thus for more recently employed staff, the CWL appeared to have increased retention and duration of employ.
7. Those with higher levels of position (lead teachers and above) were more likely to stay than those in aide positions. As wages increased, employees were considerably more likely to stay. And finally, those with 15 credits or more in early childhood education

were much more likely to stay than those without such education. These findings were true for both pilot and comparison employees.

STRUCTURE: POST CWL RETENTION EVALUATION

Post CWL Evaluation Research Questions Regarding Retention

In the year following the ending of the CWL project, we examined whether retention rates of pilot employees remained the same as they had during the CWL implementation years, and whether the retention rates of pilot and comparison centers had become more similar or different. Specifically, in the year following the completion of the CWL we examined whether:

1. There were differences in the overall percentage of employees who were retained;
2. Retention rates varied by employee position;
3. Retention rates varied by total length of employ of employees;
4. Retention rates varied by levels of employee education.

Respondents Included in Post CWL Evaluation Analysis

During the year subsequent to the CWL, respondents (directors) continued to report a hire date (and leaving date, if appropriate) for each employee identified in any wave of data collection (data collected during the pilot, and subsequently). Consequently it was possible to calculate the duration of time that each employee had been with the center (number of months of employ), and to calculate the number and percentage of employees who had been retained by the end of the reporting period (May 2004).

For purposes of the evaluation, only employees who met the criteria of the CWL (working 15 or more hours weekly in an after school program, or 20 hours or more weekly in a full day program, and also meeting the position definitions of the CWL) were included in the study. In addition, as throughout this report, the retention analyses describe the results for the employees at centers which completed all nine waves of data collected over the three years of the pilot and the fourth year, the "Post CWL year" (137 total centers, 68 pilot and 69 comparison). Some of the following retention analyses utilize the pool of employees who were present at the first wave of data collection (1,267 employees). Some of the analyses, for instance length of employ, examine the pool of employees who were present during particular years. Thus, because of missing data or different identified periods, for any particular analysis the numbers of employees may vary.

RESULTS: POST CWL RETENTION

Introduction

With the ending of the Career and Wage Ladder Pilot Project on June 30 2003, the requirements no longer existed, nor did the payments from DSHS. The results below illustrate the changes that occurred in retention in the year following the ending of the CWL. Retention is examined comparing results during the last year of the CWL and the first year of the post CWL (and in some cases over the four year reporting period), and comparing the pilot and comparison groups. Retention data is provided overall, and by subgroups (by wage, job title, employee education, length of employ).

Comparing Retention Rates Over the Four-Year Study Period for All Employees

Data provided in Table 6A illustrate the specific findings on overall retention, demonstrating the retention patterns of employees over the four year study period. In order to calculate retention, we took two points in time and determined what percentage of employees who were there at the first time were still employed at the second point in time (retained). Table 6A provides retention rates over the four year study period, the three year CWL implementation years, and in the first and second years of the pilot project.

As noted on Table 6A, the retention rates for the former pilot and comparison groups were very similar throughout each year of the pilot implementation. For instance, retention of employees present in the fall of 2000 at the start of the CWL and still present in May of 2003, at the end of the pilot project, reveals that 42% of employees were retained by both the pilot and comparison centers. Retention rates continued to be very similar between groups by the end of the school year subsequent to the pilot discontinuation. Thus, examining retention of employees present at the start of the CWL and still present in May of 2004, almost 4 years later (1 year after the ending of the CWL), reveals that 33% of employees were retained by both the pilot and comparison centers.

As expected, in each of the four years examined, overall retention declined yearly. From the start of the reporting period to the end of year 1 about three-fourths were retained, by the end of 2 years about one-half. In the last 2 reporting years attrition slowed down, and centers lost about an additional 10% of their employees each of these years. Thus the rate of leaving did not change from the last year of pilot implementation to the Post CWL year, and the percentage retained and left were the same for pilot and comparison groups.

Similar to the finding during the pilot implementation, examining the retention of all employees during the year after the CWL revealed no differences in the overall percentage of employees who were retained at former pilot centers than comparison group centers. Thus the overall employee retention rates, and rate of leaving, do not appear to have been affected by the ending of the CWL project.

Table 6A Overall Retention Rates					
N=1267 employees: 662 pilot, 605 comparison	PILOT Row %, #		COMPARISON Row %, #		
	Left	Retained	Left	Retained	Significance of Chi Square**
Oct. 2000-May 2001 (retained 1 school year)	25% 168	75% 494	27% 164	73% 441	p=.4843
Oct. 2000-May 2002 (retained 2 school years)	47% 311	53% 351	46% 281	54% 324	p=.8495
Oct. 2000-May 2003 (All CWL YRS: retained 3 school yrs)	58% 383	42% 279	58% 354	42% 251	p=.8127
Oct. 2000-May 2004 (POST CWL: retained 4 school yrs)	67% 443	33% 219	67% 407	33% 198	p=.8934

**p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
**If differences statistically significant (.05 or smaller), significance noted in bold/italics

Comparing Overall Retention Rates for <u>Last CWL and First Post CWL Year</u>

In order to isolate the possible retention effects of the discontinuation of the CWL, we also examined overall retention of employees the last year of the CWL and the first post CWL year. As explained earlier, this one year time frame comparison allows these groups to be comparable: because the post CWL evaluation study lasted for one year, and the full CWL pilot lasted for three years, in order to compare the same duration, this comparison examines two single years. For the last year of the pilot, retention was measured for any employee who was present in June 2002. For the first year after the pilot, retention was measured for any employee who was present in June of 2003.

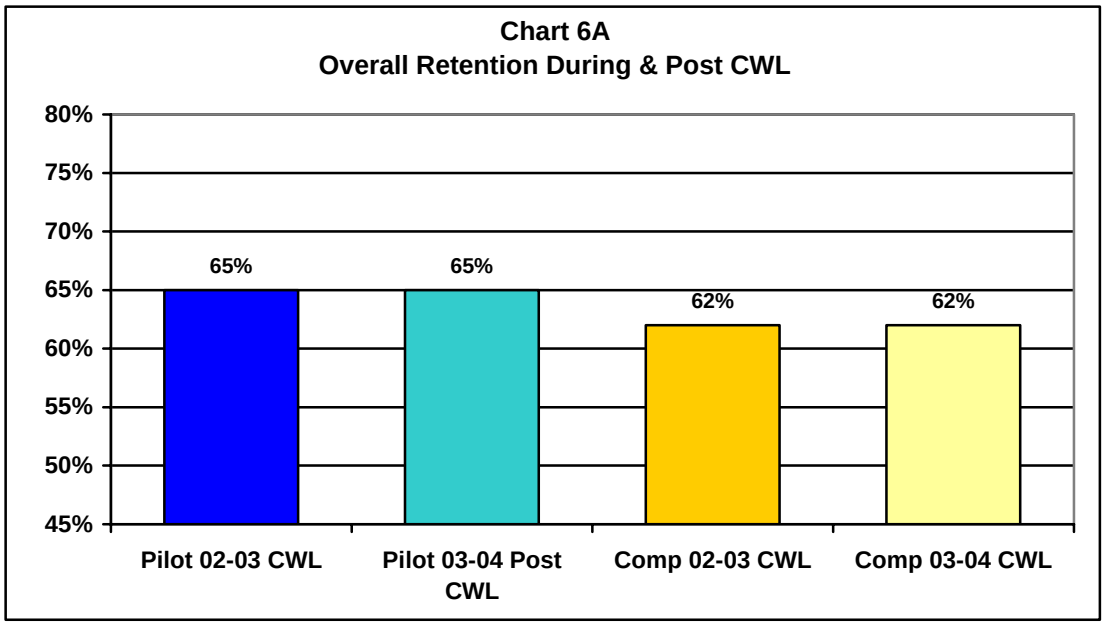
Table 6B and Chart 6A illustrate the retention of employees who were present at the start of the last year of the CWL to the end of end of that year (retention from June of 2002 until May of 2003). Table 6B contrasts these rates with the retention rates of those present from the start of the first year after the CWL until the end of that year (retention from June 2003 until May 2004).

The findings reveal that the retention rates were virtually identical for the two years when comparing pilot to pilot retention, or comparison to comparison. The results also illustrate that there were no significant differences in retention rates between pilot and comparison in either of the two years. For both groups, for both years about 2/3's of the employees were retained.

Table 6B Retention Rates: Last CWL and First Post CWL Years					
	PILOT Row #, %		COMPARISON Row #, %		
	Left	Retained	Left	Retained	Significance of Chi Square** by year
Retention June 2002-May 2003 (last CWL year)	244 35%	461 65%	243 38%	400 62%	p=.2245
Retention June 2003-May 2004 (Post CWL Year)	238 35%	444 65%	245 38%	392 62%	p=.1678
Significance of Chi Square **For pilot & comparison separately**	p=.9105		p=.8051		

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

**If differences statistically significant (.05 or smaller), significance noted in bold/italics



Comparing Retention Rates <u>Based on Position Held By Employees</u>, During Last Year of CWL Implementation, Post CWL Year, and Over Four-Year Reporting Period

Table 6C depicts the retention rates of employees categorized by position. In order to determine whether the retention rates were different during the pilot and afterwards, three sets of retention data are provided for each position: the last year of the CWL pilot, the first year after the end of the CWL project, and the retention for the full four-year reporting period. For each analysis, job title was determined at the beginning of each reporting period.

Aides/Assistants had the lowest retention rates; only 24% of pilot and 18% of comparison aides were retained for the four-year reporting period. For each reporting period pilot aides were retained at a higher rate than the comparison aides. When examining retention for the last year of the CWL and over the 4 years, this difference between the groups approached statistical significance. As with aides, for each reporting period, pilot lead teachers were consistently retained at a higher rate than the comparison lead teachers. This difference approached statistical significance both the last year of CWL implementation, and over the 4-year period. The difference between pilot and comparison groups was statistically significant the year following the CWL.

The story for administrators (site coordinators, program supervisors, assistant directors, and directors) is the opposite. Throughout the pilot, and in the post CWL year, comparison centers retained their administrators at a higher rate than did pilot centers. However, even though percentage differences in some cases are fairly large, none of these differences were statistically significant (probably due to the small numbers of employees in these groups).

Examining retention by position demonstrates that generally the higher the level of position the greater the likelihood that employees would be retained. This was true during and after the CWL, and for both pilot and comparison groups. Using the pilot/comparison group analysis, the data suggests that there may have been a slight positive effect of the CWL on the retention of pilot aides and lead teachers, and perhaps a slight negative effect on the retention of pilot administrators. This pattern existed during the CWL and for the year following the ending of the CWL.

Table 6C Retention Rates by JOB TITLE					
	PILOT Row %, #		COMPARISON Row %, #		
	Left	Retained	Left	Retained	Significance of Chi Square**
AIDES/ASSISTANTS ***Last Year CWL*** June 02-May 03	43% 118	57% 159	50% 110	50% 110	p=.1001
Year after CWL June 03-May 04	42% 102	58% 142	45% 84	55% 104	p=.5493
4 report years Oct 00-May 04	76% 193	24% 62	82% 167	18% 37	p=.1099
LEAD TEACHERS ***Last yr CWL*** June 02-May 03	32% 108	68% 232	37% 112	63% 188	p=.1388
Year after CWL June 03-May 04	33% 116	67% 232	42% 131	58% 182	***p=.0238***
4 report years Oct 00-May 04	63% 196	37% 113	70% 185	30% 80	p=.1067
SITE COORDINATORS ***Last yr CWL*** June 02-May 03	31% 5	69% 11	22% 2	78% 7	p=.6294
Year after CWL June 03-May 04	54% 7	46% 6	50% 6	50% 6	p=.8475
4 report years Oct 00-May 04	71% 15	29% 6	71% 10	29% 4	p=1.0000
PROGRAM SUPERVISORS ***Last year CWL*** June 02-May 03	19% 6	81% 26	10% 3	90% 27	p=.3284
Year after CWL June 03-May 04	15% 4	85% 22	11% 3	89% 24	Test not valid (cell size)
4 report years Oct 00-May 04	44% 21	56% 27	41% 25	59% 36	p=.7716
DIRECTORS & ASST. DIRECTORS ***Last year CWL*** June 02-May 03	9% 3	91% 32	7% 5	93% 63	p=.8268
Year after CWL June 03-May 04	9% 3	91% 29	6% 4	94% 59	Test not valid (cell size)
4 report years Oct 00-May 04	31% 4	69% 9	26% 14	74% 40	p.7236

**p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italics

Comparing Retention Rates, Based on Wage of Employees During the Last CWL Implementation Year and Post CWL

Table 6D illustrates the retention of employees based on wage for the last year of the CWL and the Post CWL year. For this analysis, wage was measured at the start of each reporting period. Wage is divided into 3 categories: low, mid, and high wage. Because wages changed each year as a result of annual state minimum wage increases, the wage groupings are somewhat different for each report year. Following are the wage categories used for each year.

	Last CWL Year	Post CWL Year
Low wage	Less than $7.75	Less than $7.95
Mid Wage	$7.76-9.00	$7.96-9.15
High Wage	$9.00 and up	$9.16 and up

As Table 6D depicts, wage was highly related to retention (p=<.0001). Whether examining the pilot or the comparison group, or whether examining the last year of the pilot or the post CWL year, the higher an employee's wages, the more likely that employee was to be retained. There was no difference found in the patterns of retention by wage measured in the last year of the pilot versus the post CWL year.

Table 6D
Retention Rates by WAGE: Last CWL and Post CWL Years

	LAST CWL Year Row #, %		**POST CWL Year Row #, %**		
	Left	**Retained**	**Left**	**Retained**	**Significance of Chi Square** by wage**
PILOT Group					
Low Wage	48 50%	48 50%	53 51%	50 49%	p=.8373
Mid Wage	103 43%	135 57%	93 43%	122 57%	p=.9963
High Wage	86 25%	261 75%	92 25%	272 75%	p=.8800
Significance of Chi Square Pilot by year**	***p=<.0001***		***p=<.0001***		
COMPARISON Group					
Low Wage	155 50%	153 50%	130 48%	142 52%	p=.5430
Mid Wage	44 32%	94 68%	64 38%	104 62%	p=.2579
High Wage	35 20%	137 80%	51 26%	145 74%	p=.1996
Significance of Chi Square Comparison by year**	***p=<.0001***		***p=<.0001***		
	Significance of Chi Square Pilot vs. Comparison Groups CWL and Post CWL Years**				
	No differences found for any wage groups				

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation differences are due to chance.

** If differences statistically significant (.05 or smaller), significance noted in bold/italics

Comparing Retention Rates, Based on the Length of Employment During the Last CWL Implementation Year and Post CWL

At the start of the pilot about 17% of pilot and 18% of comparison employees had been at their centers for six years or more (some as long as 34 years). One might expect that the retention of these longer-term employees in both groups might not be affected by the pilot project. They had appeared to have already made the decision to stay at their center, prior to CWL implementation. Therefore, longer length of employ potentially could have confounded differences in retention results between the pilot and comparison groups and between the CWL implementation years and the year afterwards. To control for the effects of length of employ, we examined retention by three sets of hire dates: short term, mid term, and long term. The actual dates of hire for these categories varied by the reporting year. Following are the hire date categories used for each year.

	Last CWL Year (% retained by May 2003) Hired…	Post CWL Year (% retained by May 2004) Hired…
Short Term	July 1-Nov. 1, 2002	July 1-Nov. 1, 2003
Mid Term	July 1 1995-Jan. 1, 2002	July 1 1995-Jan. 1, 2003
Long Term	Before July 1, 1995	Before July 1, 1995

As depicted on Table 6E retention rates varied greatly based on hire date. Recent hires (short term) had the lowest retention rates. For instance, during the last year of the CWL, pilot centers retained 59% and comparison centers 62% of their recently hired staff. Long term employees were the most likely to continue to be retained; 87-90% of these employees were retained. This pattern existed whether examining the pilot and comparison groups, or the CWL implementation year and the post CWL year. Comparing pilot to pilot or comparison to comparison, there were no significant differences in retention rates between the last year of the CWL or the post CWL based on hire dates.

There were also no differences between the pilot and comparison groups either year examined, except for one exception. When comparing pilot and comparison centers during the post CWL year, pilot centers were more likely to retain mid term employees than were comparison centers.

We speculate this is related to the post CWL wage policies reported in the phone survey. Many former pilot center directors reported maintaining the pilot wages of employees hired during the CWL implementation year, even though they paid wages lower than CWL rates for new hires (see Chapter 2, for an explanation of how centers changed their wage policies after the pilot ended). Thus after the pilot ended, many of those on staff during the CWL (and still there the subsequent year) were still paid at higher rates than those of the general child care center community. This may have increased the likelihood of retention for this group.

Thus examining retention rates of employees hired at different points in time reveals that the longer an employee had been at a center, the greater the likelihood that they would be retained. This pattern was true during and after the CWL period and for both pilot and comparison employees. However, the ending of the CWL seemed to have disrupted retention patterns for mid term employees at former pilot centers, increasing their retention rate in the post CWL year, over what we found in the comparison group.

Table 6E Retention Rates by HIRE DATES: Last CWL and Post CWL Years					
	PILOT Row %, #		COMPARISON Row %, #		
	Left	Retained	Left	Retained	Significance of Chi Square** by Pilot/Comp
SHORT TERM Retention ***last year CWL***	41% 45	59% 66	38% 44	62% 73	p=.6499
Retention ***post CWL year***	36% 34	64% 61	34% 27	66% 52	p=.8244
Significance of Chi Square **Pilot & Comp by year**	p=.4845		p=.6241		
MID TERM Retention ***last year CWL***	34% 170	66% 333	38% 174	62% 288	p=.2105
Retention ***post CWL year***	34% 172	66% 329	40% 185	60% 275	***p=.0592***
Significance of Chi Square **Pilot & Comp by year**	p=.8583		p=.4263		
LONG TERM Retention ***last year CWL***	14% 14	87% 87	10% 9	90% 82	p=.3975
Retention ***post CWL year***	10% 9	90% 79	11% 9	89% 74	p=.8956
Significance of Chi Square **Pilot & Comp by year**	p=.4459		p=.8366		

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italics

Comparing Retention Rates, Based on Levels of Employee Education, During the Last CWL Implementation Year and Post CWL

During the CWL implementation years those with at least 15 college credits in early childhood education were more likely to be retained than those without such education. These findings were true for both pilot and comparison employees. With the ending of the CWL, wage subsidies were no longer provided by the state for increased employee educational attainment. To assess whether the CWL discontinuation affected retention by educational attainment, we examined whether retention rates changed between the last year of the CWL and the post CWL year, and whether there were differences between the pilot and comparison groups.

Table 6F depicts the findings of the retention by educational attainment analysis. For this analysis, education level was measured at the start of a reporting period. Attainment is divided into the following three groups.

(1) **No College:** Those who had completed no early childhood college credits (STARS only, high school diploma, or no high school diploma);
(2) **Some College:** Those who had completed 15-45 early childhood related college credits;

(3) **Degreed:** Those who had completed an early childhood related college degree (AA, BA, or MA).

Two important caveats should be noted regarding educational attainment: (1) the total number of employees with 15 early childhood college credits or more was a relatively small percentage of the total workforce, and (2) pilot centers had a higher proportion of more educated staff than comparison centers did for both by the last year of the CWL and the subsequent year (see Chapter 5 on Education for more details). For instance, in the last year of the CWL educational attainment was reported for 642 pilot employees. Of these pilot employees 62% had no college, and 38% had 15 credits or more. For the last year of the CWL of the 578 comparison employees, 71% had no college and 29% had 15 credits or more.

The year subsequent to the pilot project, as during the CWL, a higher percentage of those with at least 15 credits of early childhood education were retained than those without such education. These findings were true for both pilot and comparison employees. The percentages retained by educational grouping were not statistically different for the pilot and comparison groups.

Table 6F
Retention Rates by EDUCATIONAL ATTAINMENT: Last CWL and Post CWL Years

	PILOT Row %, #		**COMPARISON Row %, #**		
	Left	**Retained**	**Left**	**Retained**	**Significance of Chi Square** by Pilot/Comp**
NO COLLEGE Retention ***last year CWL***	38% 152	62% 247	43% 175	57% 236	p=.1935
Retention ***post CWL year***	40% 136	60% 204	45% 172	55% 211	p=.1828
Significance of Chi Square Pilot & Comp by year**	p=.5967		p=.5084		
SOME COLLEGE Retention ***last year CWL***	28% 21	72% 54	36% 27	64% 48	p=.2936
Retention ***post CWL year***	31% 56	69% 126	20% 23	80% 90	***p=.0495***
Significance of Chi Square Pilot & Comp by year**	p=.6595		***p=.0174***		
DEGREED Retention ***last year CWL***	28% 47	72% 121	27% 25	73% 67	p=.8901
Retention ***post CWL year***	27% 39	73% 108	31% 34	69% 77	p=.4691
Significance of Chi Square Pilot & Comp by year**	p=.7739		p=.5892		

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italics

Reasons Reported for Staff Leaving

In examining why employees were reported by directors to have left the employ of their center, the same core reasons were given by both comparison and pilot groups, and for the last year of the CWL, and the year after the CWL. When collapsing those reasons into 2 categories of fired versus any other reason, there were no statistical differences between the pilot and comparison for either of the single years. However, just **examining pilot centers for the two years reveals that pilot centers were less likely to fire employees in the year subsequent to the CWL than they were during the CWL. This difference was statistically significant** (p=.0217). See Table 6G for details regarding why employees left their positions.

We speculated that the firing rate may have decreased at former CWL centers in the Post CWL year as a result of lower wages being paid to new employees. With the elimination of the CWL wage subsidies, pilot centers became more like comparison centers, paying lower wages for newly hired employees. Most of the fired staff were recent hires and in the lower pay bracket. We theorize that these former pilot centers may have experienced difficulty replacing low paid staff in the post CWL year, and therefore fired fewer of them than they had during the CWL when they could pay higher wages and attract more qualified applicants.

Table 6G
Why Employees Left

Categories	Last CWL Year: June 02-May 03 Column %		Post CWL Year June 02-May 03 Column %	
	Pilot	**Comparison**	**Pilot**	**Comparison**
Fired, poor performance	17%	20%	10%	13%
Laid off	8%	3%	7%	8%
Laid off, because of CWL end	---	---	2%	---
Quit to go to school	11%	6%	15%	12%
Quit, moved to new early childhood job	12%	19%	9%	12%
Quit, left early childhood field	17%	19%	17%	17%
Quit, other work related	1%	9%	4%	8%
Quit, personal reasons	33%	24%	28%	32%
Quit, because of CWL end	---	---	10%	---
Significance of Chi Square Fired vs. all else, by year**	p=.5322		p=.3372	
Significance of Chi Square** Fired vs. all else*; Pilot group* by year Fired vs. all else*; Comparison* by year	***p=.0217*** ***p=.0549***			

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation differences due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italics

Summary

The findings on retention demonstrate the very inter-related nature of workforce behavior: wage, total length of employ, job title, and employee education all impacted retention rates both during the CWL implementation and afterwards. These factors also interacted with the reasons why employees were not retained. For instance, a generally poorly trained workforce may result in the firing of poorly performing employees; however, if sufficient wages are not available to attract more qualified employees, firing may not occur. Levels of wage are highly significant to retention, with higher paid employees being more likely to stay. Higher levels of responsibility also predict better retention, and of course these levels are interrelated with performance and wage (higher position usually means higher pay). Having completed early childhood education credits increases the likelihood of retention. This education may be illustrating commitment to the field, but it might also mean better performing staff who have achieved higher staff positions. Further, longer length of employ predicts the likelihood of retention. This may also be a marker of commitment to the field, but may also be related to any of the previous factors (quality of performance, level education, position, wage). Thus none of these factors work in isolation, and therefore when any factor related to retention is examined separately, the outcome is not always predictable. Specifically, key findings comparing retention during the CWL and in the year subsequent to the CWL are as follows.

1. Similar to the finding during the pilot implementation, examining the retention of all employees during the year after the CWL revealed no differences in the overall percentage of employees who were retained at former pilot centers than comparison group centers. For both pilot and comparison groups, for the last year of the CWL and the Post CWL year, about two-thirds of the employees were retained.

2. Examining retention by position demonstrates that generally the higher the level of position the greater the likelihood that employees would be retained. This was true during and after the CWL, and for both pilot and comparison groups. Using the pilot/comparison group analysis, the data suggests that there may have been a slight positive effect of the CWL on the retention of pilot aides and lead teachers, and perhaps a slight negative effect on the retention of pilot administrators. This pattern existed during the CWL and for the year following the ending of the CWL.

3. Wage was highly related to retention. Whether examining the pilot or the comparison group, or whether examining the last year of the pilot or the post CWL year, the higher an employee's wages, the more likely that employee was to be retained.

4. Examining retention rates of employees hired at different points in time reveals that the longer an employee had been at a center, the greater the likelihood that they would be retained. This pattern was true during and after the CWL period and for both pilot and comparison employees. However, the *ending of the CWL seemed to have disrupted retention patterns* for mid term employees at former pilot centers increasing their likelihood of being retained in the post CWL year, over what we found in the comparison group. We speculate that this is related to the finding that in the year following the CWL, many pilot centers maintained the CWL wages of employees hired during the CWL. Thus mid term employees were still paid at a higher rate at former CWL centers than those in the general child care center community, thereby increasing their likelihood to stay.

5. The year subsequent to the pilot project, as during the CWL, a higher percentage of those with at least 15 credits of early childhood education were retained than those without such education. These findings were true for both pilot and comparison employees.

6. In examining why employees were reported by directors to have left the employ of their center, the same core reasons were given by both comparison and pilot groups, and for the last year of the CWL, and the year after the CWL. However, just *examining pilot centers for the two years reveals that pilot centers were less likely to fire employees in the year subsequent to the CWL than they were during the CWL*

CHAPTER 7

RESULTS: SPRING 2004 OBSERVATIONAL STUDY

Introduction

The ultimate aim of the Career and Wage Ladder pilot project was to improve the quality of care provided to children in licensed child care centers in Washington state. Observational study is the best way to assess quality, but it is time and labor intensive, and consequently, quite costly. Thus, the use of observational data collection in this study was limited. In the spring of the final year of the evaluation study (2003), a sub-sample of both pilot and comparison centers (e.g., 33 teachers from 25 pilot centers and 33 teachers from 25 comparison centers) were observed in their classrooms, and quality of environment and teacher-child interaction were assessed. To provide a post-CWL comparison, the observational study was repeated in the spring of 2004. We observed in the same age group classrooms (pre-school aged children) and attempted to observe the same teachers. Because some centers chose not to participate, the sample in 2004 included 60 teachers (31 from 23 former pilot centers and 29 from 22 comparison centers). In 33 of the cases (55%) we were able to observe the same teachers in both 2003 and 2004.

Protocol

To identify our sample of teachers to observe in 2004, we began with the sample of centers and teachers that had been observed in 2003. If a teacher was no longer employed at that center, or if he/she was no longer working with preschool aged children, another teacher was selected for observation. We did not add centers that had not participated in the study in 2003, but did observe some teachers that had not been previously observed. Table 7A indicates the match of the centers on a variety of characteristics. This table indicates that the sub-sample of centers involved in the 2004 observational study were not substantially different from those observed in 2003.

Table 7A
Match of Pilot and Comparison Centers chosen for Observational Study
(match with centers completing survey 1-9 and with each other)

Characteristics	Centers chosen for observation study 2003		Centers chosen for observation study 2004	
	Pilot N = 25	Comparison N = 25	Pilot N = 22	Comparison N = 22
Avg. Licensed Capacity	58	54	58	59
Avg. # DSHS children	23	23	27	24
Avg. % DSHS children	41	44	52	41
% Metro	56	56	61	55
% Small Urban	24	20	17	22
% Rural	20	24	22	23
% East side of state	32	28	26	32
% West side of state	68	72	74	68

The protocol utilized to collect observational data was the same as we used in 2003. Centers were invited to participate, but could choose not to, and the director could select the teacher who would be observed. For details on the protocol see Boyd & Wandschneider

(2004). Three of the observers from the previous year's observational study were utilized in this data collection, and three other observers were trained to reliability in a two-day training in Seattle.

Table 7B reports the characteristics of the 60 teachers that were observed in the spring of 2004. As with our previous observation, the pilot and comparison groups were quite similar in terms of several characteristics, such as age, length of time in the field and at their current center. Mean wage remained higher in the former pilot teachers.

Table 7B
Observational Sample Description, Teacher Characteristics

	Former Pilot N = 31	**Comparison N = 29**
Mean age	35	40
Ethnicity	87% Caucasian	86% Caucasian
Gender	1 male, 30 female	29 female
Mean years in field	11.04 (range 1-32)	12.55 (range 0-35)
Mean years at center	4.97 (range 0-23)	5.88 (range 0-22)
Mean wage	$10.35	$9.84

Observation Instruments

The Early Childhood Environmental Rating Scale-Revised (ECERS-R, Harms, Clifford & Cryer, 1998) was used to provide an overall assessment of the classroom environment (see 2004 report for a copy of this instrument). The ECERS-R assesses multiple aspects of the environment through items on the following subscales: Space and Furnishings, Personal Care, Language/Reasoning, Activities, Interaction, Program Structure, Parents and Staff. Each item is rated on a 7-point Likert scale with 1 indicating inadequate quality; 3, poor quality; 5, good quality; and 7 indicating excellent quality. The rating scale was completed after a three hour observation by the trained observer. Twelve observations (20%) were conducted by two observers simultaneously to allow for the calculation of inter-rater reliability. These so-called "double-coded observations" were conducted between March 24 and May 22 of 2004, spanning virtually the entire time frame of observational data collection. The percentage of agreement indicates the degree of reliability between two observers and can range from 0 to 100%. The range in percent agreement on the ECERS-R was 86 to 100% with an average of 93% agreement.

The Caregiver Interaction Scale (CIS, Arnett, 1989) was used to assess the quality of caregiver-child interaction (see 2004 report for a copy of this instrument). The instrument contains 26 items describing the nature and tone of interactions. Each item is rated on a 1 (not at all like this classroom) to 4 (very much like this classroom) scale. The scale is completed after a 45-minute observation by a trained observer. Four factors, sensitive, harsh, detached and permissive, have been identified from the scale, although the permissive scale does not always result in high internal consistency and thus has been sometimes dropped from analysis. The range in observer agreement on the CIS was from 73% to 100%, with an average of 96% agreement.

Survey Instruments
During the same site visit, following the observation, the teacher was surveyed on the following constructs (see 2004 report for a copy of these instruments).

The Early Childhood Job Satisfaction Survey. (ECJSS, Jorde-Bloom, 1985). Nineteen items, representing two separate facets from the ECJSS were used to assess satisfaction with (1) the nature of the work itself, and (2) pay and opportunities for promotion. The items are evaluative in nature and were presented in a yes/no (true/false) format. For each item, teachers were asked to indicate agreement with a specific statement. For unfavorable statements, the scoring was reversed resulting in a possible range of scores from 0-10 for each subscale. A low score represents a negative attitude toward that job facet, a high score a favorable attitude. This instrument has shown good internal consistency when used with a population of teachers and assistant teachers in child care centers (Stremmel, 1991).

Intention to leave. Four items used by Stremmel (1991) to assess intention to leave (e.g., "I intend to work here at least another year," and "I often think of quitting") were included in the survey. These items were rated on a 5-point scale ranging from strongly disagree to strongly agree. These items showed good internal consistency when used with a population of teachers and assistant teachers in child care centers (Stremmel, 1991).

Professional Orientation was measured with 13 items developed by Jorde-Bloom (1991). For example, respondents were asked to indicate if they considered their work "a career" or "just a job," the number of professional books read last year, what professional organizations they currently paid dues to. The score could range from 0-19.

The Didactic Belief Scale. (Stipek & Byler, 1997). Respondents completed a 31 item questionnaire designed to assess teachers' endorsement of practices associated with a basic-skills or a child-centered orientation. Teachers indicated on a 5-point scale the degree to which they agreed or disagreed with statements such as "Basic skills should be the teacher's top priority" (basic skills item) or "Children learn best through active, self-initiated exploration" (child-centered item). Thus, each teacher's responses were used to create a Basic-Skills score and a Child-Centered score. Some items in each subscale were reverse scored and thus a high score indicated a stronger belief in that particular set of practices.

Results

***ECERS*.** In 2003, we had found that the overall score on the ECERS-R was higher at a statistically significant level in the pilot group than the comparison group. While the subscale scores did not show statistically significant difference, for a number of the subscales, the differences were very close to being significant, with p values hovering around the .05 level on the space and furnishings, interactions, activities, and parent/staff subscales. The results provided clear evidence that the pilot centers were providing higher quality of care than the comparison centers. With the completion of the ECERS-R again in 2004, we found that the scores of the former pilot center teachers were about the same or lower than those reported in 2003. While the pilot scores were still higher than the comparison centers, the differences were generally not statistically significant (see Table 7C for subscale and overall ECERS scores). The only significantly different scores in 2004 were in the language/reasoning and activities subscales. It is interesting to note, that while significantly different, these scores are lower than they were in 2003 in both the pilot and comparison centers.

To examine the significance of the difference between scores in 2003 and 2004, paired t-tests were calculated. Table 7d reports the results of the t-tests comparing scores on the ECERS in 2003 and 2004 for former pilot center teachers only. The results indicate that for the 20 teachers observed at both points in time, the differences were not statistically significant, except for the case of personal care routines, which decreased from 5.54 to 4.96 (***p=.02***). The lack of statistical significance may be due to small sample size. The overall pattern of change is one of decrease, except space and furnishing which remained essentially the same.

These ECERS analyses suggest that with the end of the CWL, the previously noted difference in quality had disappeared. However, a significant decrease in overall quality of care was not seen in the pilot centers for whom this effect would have been expected to be largest.

Table 7C
ECERS-R Average Subscale Scores Spring 2003 and 2004
Pilot and Comparison separated

	2003			2004		
Subscales	**Pilot (N = 33)**	**Comparison (N = 33)**	**Sig. of t-test****	**Pilot (N = 31)**	**Comparison (N = 29)**	**Sig. of t-test****
Space/Furnishings	5.43	4.94	p=.08	5.45	4.92	p=.06
Personal Care	5.35	4.96	p=.22	4.79	4.73	p=.86
Language/Reasoning	5.42	4.92	p=.12	5.31	4.41	***p=.02***
Activities	4.72	4.17	p=.07	4.68	3.85	***p=.03***
Interaction	6.00	5.42	p=.06	5.71	5.42	p=.41
Program Structure	4.80	4.19	p=.61	5.66	5.06	p=.11
Parents/Staff	5.41	4.95	p=.07	5.20	4.83	p=.21
Overall Average Score	5.30	4.80	***p=.036***	5.18	4.67	p=.07

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Table 7D
ECERS-R Average Subscale Scores May 2003 & 2004 compared
PILOT CENTERS ONLY

Subscales	**2003 Scores N = 20**	**2004 Scores N = 20**	**Significance of t-test****
Space/Furnishings	5.43	5.45	p=.91
Personal Care	5.54	4.96	***p=.02***
Language/Reasoning	5.59	5.21	p=.20
Activities	4.89	4.73	p=.50
Interaction	5.95	5.69	p=.38
Program Structure	5.88	5.55	p=.36
Parents/Staff	5.67	5.26	p=.11
Overall Average Score	5.37	5.20	p=.38

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

***CIS*.** As with the ECERS, the scores on the CIS in 2003 were also higher for the pilot than the comparison teachers. Table 7E presents the mean scores on the CIS subscales and overall mean score in 2003 and 2004. In 2003, almost all of the subscales were statistically significantly higher in the pilot than the comparison teachers. These higher scores for the pilot centers indicates a more positive interaction style than that of the comparison centers. This pattern did not continue in 2004. There were no significant differences in the interaction style of the former pilot and comparison center teachers. Their interactions styles were essentially the same, and were often lower in the former pilot center teachers than they had been in 2004.

Table 7E
CIS Average Subscale Scores Spring 2003 and 2004
Pilot and Comparison separated

Subscales	2003		Sig. of t-test**	2004		Sig. of t-test**
	Pilot (N = 31–33)	Comparison (N = 32–33)		Pilot (N = 31)	Comparison (N = 29)	
Sensitivity	3.55	3.28	***p=.05***	3.13	2.95	p=.31
Punitive	3.81	3.60	***p=.04***	3.82	3.76	p=.45
Detached	3.84	3.65	p=.09	3.59	3.62	p=.85
Permissive	3.92	3.78	***p=.05***	3.60	3.78	p=.19
Overall Average Score	3.78	3.58	***p=.013***	3.44	3.36	p=.42

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Table 7F presents the results of the comparison of the CIS scores for pilot center teachers who were observed in both 2003 and 2004. Here, it is clear that interaction style has significantly changed and generally for the worse. In terms of sensitivity and detachment, these pilot center teachers displayed lower quality of interaction with children. The punitive score remained the same, while the permissive score improved.

Table 7F
CIS Average Subscale Scores May 2003 & 2004 compared
PILOT CENTERS ONLY

Subscales	2003 scores N = 20	2004 scores N = 20	Significance of t-test**
Sensitivity	3.58	3.12	***p=.01***
Punitive	3.83	3.82	p=.91
Detached	3.83	3.53	***p=.04***
Permissive	3.08	3.61	***p=.02***
Overall Average Score	3.63	3.43	***p=.03***

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

These CIS analyses suggest that, unlike the ECERS results, with the end of the CWL, the previously noted difference in interaction style had not only disappeared, but had been replaced by a lower level of interaction in the pilot center classrooms.

***Teacher attitudes*.** In 2003, when classroom observations were completed, we also asked teachers to complete a survey of their work attitudes. Table 7G presents the results of teachers report of their work satisfaction, including professional orientation and intention to leave the position in May of 2003 and again in 2004 for both Pilot and Comparison teachers. In 2003, pilot teachers reported statistically higher satisfaction with pay and promotion and higher professional orientation. Intention to leave and satisfaction with the work itself was no different in pilot and comparison teachers. Examining these scores in 2004, we see that the differences that did exist between the pilot and the comparison groups had disappeared. Former pilot center teachers are no more satisfied with their pay and promotion, nor do they report a higher degree of professional orientation.

As with previous analyses, we also compared these scores for the same teachers in May of 2003 and May of 2004. Table 7G reveals that when examining change in specific teachers attitudes, satisfaction with pay and promotion statistically significantly declined between 2003 and 2004. In addition, their intention to leave their position increased at a statistically significant level.

These results suggest that participation in the CWL increased teachers' satisfaction with their pay and their professional orientation, and that the loss of the CWL resulted in a decrease in this satisfaction and professional orientation. It also increased their reported intention to leave their current positions.

Table 7G
Teacher Work Attitude Average Subscale Scores Spring 2003 and 2004
Pilot and Comparison separated

	2003			2004		
Subscales	**Pilot (N = 33)**	**Comparison (N = 33)**	**Sig. of t-test****	**Pilot (N = 31)**	**Comparison (N = 29)**	**Sig. of t-test****
Satisfaction with Pay and Promotion	35.24	31.48	***p=.03***	31.45	29.44	p=.27
	Possible range = 10-50					
Satisfaction with Work Itself	36.58	36.52	p=.97	36.06	35.43	p=.57
	Possible range = 9-45					
Professional Orientation	8.64	7.03	***p=.04***	8.43	8.34	p=.92
	Possible range = 0-13					
Intention to Leave	7.45	8.45	p=.33	10.55	9.72	p=.34
	Possible range = 5-20					

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Table 7H Teacher Work Attitude Average Subscale Scores May 2003 & 2004 compared PILOT CENTERS ONLY			
Subscales	**2003 scores N = 20**	**2004 scores N = 20**	**Significance of t-test****
Satisfaction with Pay and Promotion	33.45	30.45	***p=.04***
	Possible range = 10-50		
Satisfaction with Work Itself	35.97	35.66	p=.82
	Possible range = 9-45		
Professional Orientation	8.43	8.30	p=.77
	Possible range = 0-13		
Intention to Leave	6.76	9.85	***p=.00***
	Possible range = 5-20		

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

In order to assess the effects of increased training we measured teachers' endorsements of attitudes that were characterized as either a child centered orientation that is consistent with NAEYC developmentally appropriate practices or more basic skills oriented. We hypothesized that pilot teachers might endorse attitudes that were more child centered, as developmentally appropriate practices are likely to be presented in most trainings or ECE classes. Table 7I presents the average scores on the two subscales related to attitudes toward best practice in 2003 and 2004. The score pattern in 2003 was in the direction we hypothesized, but the differences were not statistically significant. That is, pilot teachers scored lower on basic skills and higher on child centered scores, and the reverse was true of comparison centers. The same pattern was apparent in 2004, but again was not statistically significant.

Table 7I Beliefs About Best Practice Average Subscale Scores						
	2003			**2004**		
Subscales	**Pilot N = 33**	**Comparison N = 33**	**Significance of t-test****	**Pilot N = 31**	**Comparison N = 29**	**Significance of t-test****
Basic Skills Orientation	40.55	44.37	p=.16	33.10	34.97	p=.44
Child Centered Orientation	45.75	43.58	p=.12	45.29	41.10	p=.43

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance
** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Table 7J shows the scores for all pilot teachers that were observed twice. The Basic Skills Orientation decreased at a statistically significant level over this time period (from 41.60 to 32.50, ***p=<.00***). The Child Centered Orientation Scores remained essentially the same from one year to the next. This seems counter-intuitive and the change eludes explanation.

Table 7J Beliefs About Best Practice Average Subscale Scores May 2003 and 2004 compared PILOT CENTERS ONLY			
Subscales	**2003 Scores N = 20**	**2004 Scores N = 20**	**Significance of t-test****
Basic Skills Orientation	41.60	32.50	***p=.00***
Child Centered Orientation	44.80	45.40	p=.49

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italic

Summary

The examination of results related to quality were mixed. In terms of both overall quality (ECERS) and teacher interaction with children (CIS), the previously noted difference in pilot and comparison center teachers disappeared following the loss of the CWL, providing support for the claim that participation in the CWL positively influenced quality. However, only in terms of interaction style did we see a significant decrease in the scores during the Post-CWL year. It may be that teachers' interaction style is more sensitive to changes in issues of wage, benefits, etc., while global quality is more robust to effects of this type of change. Changes to teacher attitudes also were mixed. Satisfaction with pay and promotion decreased from during the CWL to the Post-CWL year and intention to leave increased. Satisfaction with the work itself and professionalism remained about the same, suggesting these attitudes were not influenced by the loss of the CWL. The decrease in a basic skills orientation and no change in child centered orientation is less easily interpreted and requires further examination.

CHAPTER 8

RESULTS: RESPONDENT PERCEPTIONS
Mail and Telephone Surveys

Introduction

Center directors from both pilot and comparison centers were asked several questions about their perceptions of staff attitudes (i.e., morale, knowledge about children and families, commitment to ethics) over the course of the three-year pilot project. Overall, the response to these questions revealed that pilot center directors perceived participation in the CWL positively effected employee attitudes. In the post CWL year, we also examined how director reported morale and knowledge, skills and commitment changed from the last CWL year (2003) to the end of the post CWL year (2004).

Morale

To assess staff morale (as perceived by directors) at the end of the pilot project and at the end of the post CWL year, we asked directors to estimate the morale of their employees on a 8 point scale, with 8 being very high morale, and 1 being very low morale. Our previous report (2004) showed that morale in pilot and comparison centers was the same (the mean was around 6 and not statistically different).

Examining morale at the end of the Post CWL year (May 2004) revealed a decrease in morale in former pilot centers (see Table 8A). The former pilot centers reported morale that was significantly lower (m=5.43) than the comparison centers (m=6.32, ***p=.0001***) Moreover, when change specific to a particular center was examined, it was clear that the change from 6.31 in 2003 to 5.43 in 2004 was highly significant (***p=.0009***). These mean scores and the statistical test are also reported in Table 8A. It is interesting to note that morale scores decreased in the former pilot centers at a high level of statistical significance. The comparison centers' morale scores improved, though the difference was not statistically significant. These results suggest that the end of the CWL negatively influenced morale in former pilot centers in a way that did not impact comparison centers.

Table 8A
Average Morale Rating by Directors in Spring of 2003 and 2004

	May 2003	May 2004	Significance of t-test**
Pilot N = 62	6.31	5.43	***p=.0009***
Comparison N = 67	6.04	6.32	p=.16

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italics

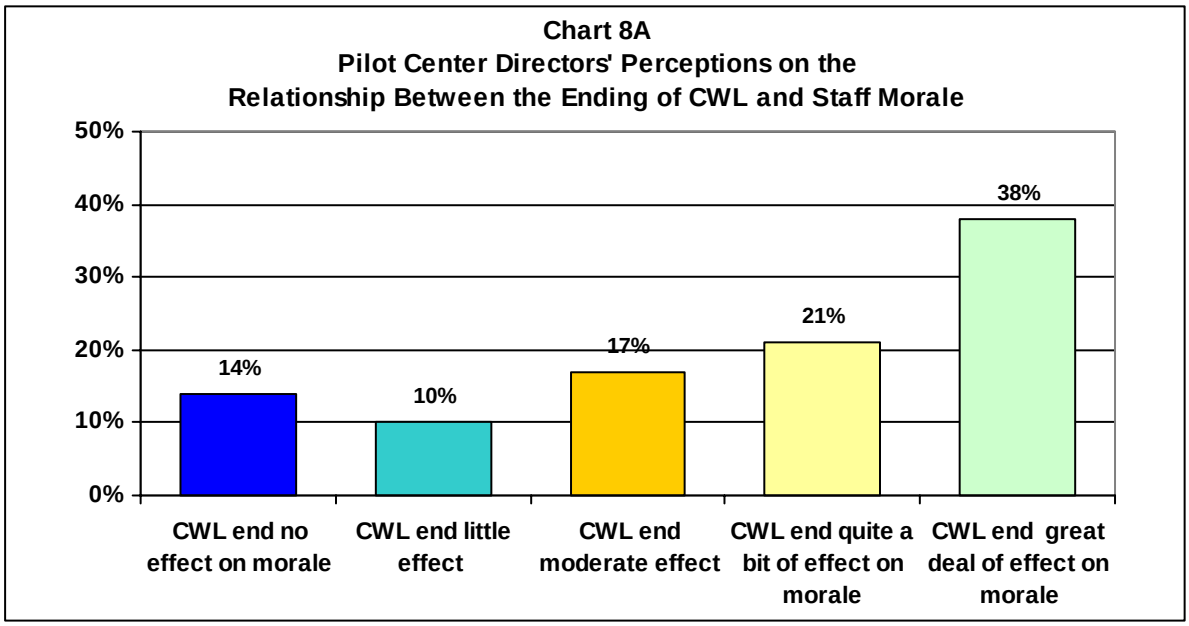
Relationship Between the Ending of the CWL and Staff Morale

We also specifically examined any potential relationship between the ending of the CWL and staff morale. During the telephone interviews former pilot directors were asked about whether and how much the discontinuation of the CWL had affected staff morale (see Chapter 2 for details on the telephone survey protocol). Directors were asked to rate the level of effect on a 1-5 point scale, with 1 being "CWL discontinuation had no effect on current staff members' morale," and 5 being "CWL discontinuation had a great deal of negative effect on current staff members' morale." Nearly 60% of the directors rated the

effect of the CWL on their staff's morale as a 4 or 5 indicating that their employees' morale had been strongly and negatively affected by the discontinuation of the CWL (see Table 8B and Chart 8A for depictions of director's perceptions of staff morale and its relationship to the ending of the CWL).

Table 8B
Pilot Center Directors' Perceptions on the Relationship Between the Ending of the CWL and Staff Morale

	% of Centers
1 = CWL discontinuation had no effect on current staff morale	14%
2 = CWL discontinuation had little negative effect on current staff morale	10%
3 = CWL discontinuation had moderate negative effect on current staff morale	17%
4 = CWL discontinuation had quite a bit of negative effect on current staff morale	21%
5 = CWL discontinuation had a great deal of negative effect on current staff morale	38%



Skill, Knowledge, Professional Ethics, Professional Commitment

Because the educational endeavors pursued by pilot center employees could potentially be of any sort (e.g., courses on curriculum design, to workshops on ages and stages of development), it was difficult to identify a set of specific abilities/dispositions which might be assessed as a result of increased educational pursuits. For these reasons, we chose to ask respondents how their employees' skills, knowledge, commitment to professional ethics and commitment to the field of early childhood care/education (general markers of good practice) had changed over the course of a school year. They could respond on a scale of 1-4, with 4 indicating improvement, and 1 indicating decline in skill, ethics, etc. By the end of the pilot project (May 2003), the mean scores revealed that pilot center respondents indicated a statistically significantly higher level of improvement in all areas except for knowledge. Table 8C shows the comparison of mean scores in these four types of change in May 2003 and May 2004. Paired t-tests were used to examine the significance of the difference of the

means. In each type of change (skill, knowledge, commitment to ethics and commitment to the field) former pilot center respondents reported a decrease in the score, indicating that the improvement in these characteristics that had been reported during the life of the CWL had disappeared in the year subsequent to the end of the CWL. There was essentially no change in these characteristics in the comparison centers from 2003 to 2004, but they were higher than the former pilot centers' scores in May of 2004 (in each case they were statistically significant ***p=<.01)***.

Table 8C
Respondent Perception of Change in Employees

	Change in Skill		**Change in Knowledge**		**Change in Commitment to Ethics**		**Change in Commitment to Field**	
	May 2003	**May 2004**	**May 2003**	**May 2004**	**May 2003**	**May 2004**	**May 2003**	**May 2004**
Pilot N = 69	4.25	3.48	4.13	3.55	4.26	3.20	4.15	3.23
Significance of T-test**	***p=<.0001***		***p=<.0001***		***p=<.0001***		***p=<.0001***	
Comparison N = 68	3.97	4.04	3.96	3.91	3.81	3.79	3.74	3.78
Significance of T-test**	p=.44		p=.65		p=.88		p=.70	

** p = level of probability that differences between groups are due to chance; p values of .05 or less considered statistically significant: little expectation that differences are due to chance

** If differences statistically significant (.05 or smaller), significance noted in bold/italics

Perceptions of Staff Professionalism Changes Related to the Ending of the CWL

We also specifically examined any potential relationship between the ending of the CWL and staff professionalism. During the telephone interviews former pilot directors were asked whether they believed the ending of the CWL, and the consequent changes they had made in their policies (see Chapter 2 for policy changes), had affected the level of staff professionalism at their center. More than half believed professionalism had decreased as a result of CWL discontinuation. Common CWL related illustrations of reduced professionalism included: staff cared less about pursuing their education without incentives for doing so, lack of good wages had resulted in staff feeling less valued and as if their work was unimportant, and lack of wages and incentives had made it more difficult to find and keep qualified staff. See Table 8D for details summarizing directors' comments regarding the relationship between changes in staff professionalism and the discontinuation of the CWL.

Table 8D Pilot Center Directors' Perceptions on Whether/How Staff Professionalism was Affected by CWL Ending	
	% of centers
Professionalism not affected	45%
Professionalism decreased	55%
Professionalism decreased as demonstrated by:	
Lack of good wages resulted in staff feeling less valued, as if their work was unimportant	21%*
Staff care less about pursuing education without incentives for doing so	17%*
Staff have decreased morale and therefore are putting in less effort	17%*
Unable to hire/keep qualified employees (educated and/or experienced)	14%*
Staff feel field/job is a stepping stone, not a career	10%*

*More than 1 response possible

Perceptions of Overall Center Quality Changes Related to the Ending of the CWL

During the telephone interviews former pilot directors were asked whether they believed the ending of the CWL, and the consequent changes they had made in their policies (see Chapter 2 for descriptions of changes in number of staff, staff benefits and wages, etc.), had affected the overall quality of their program. If they stated it had, they were asked to explain how quality had been affected. About two-thirds said quality had not been affected. For the 1/3 who believed quality had been negatively affected they most commonly attributed this to not being able to hire or keep qualified (educated or experienced) employees. See Table 8E for details regarding director perceptions of changes in center quality.

Table 8E Pilot Center Directors' Perceptions on Whether/How Quality was Affected by CWL Ending	
	% of Centers
Quality not affected	69%
Quality decreased	31%
Quality decreased because:	
Unable to hire/keep qualified employees (educated and/or experienced)	24%*
Staff morale lower so staff unwilling to put in extras (e.g., evening meetings)	6%*
Director's time taken training poorly qualified staff, so less time for other quality efforts	3%*

*More than 1 response possible

Directors' Recommendations for Change, Should the CWL be Reinstated

During the telephone interviews, and in the mail survey comment sections, most former pilot directors volunteered that they believed the CWL should be reinstated, and hoped that it would be. Most also had suggestions for changes, were it to be reinstated. Common ideas for changes included extending the annual retention/experience raises beyond 5 years and/or including prior experience at other centers in the experience raises, and ensuring long-term continuation of the project. Another common idea was increasing the Administrative Fee paid by DSHS to help cover the additional required center costs of participating in the CWL. For instance, directors had difficulty finding the funds to cover the required staff benefits and the additional payroll taxes resulting from higher wages being paid to staff. They suggested increasing the Administrative Fees to help defray these costs. Others suggested using additional Administrative Fees for scholarships to encourage staff to further their education. See Table 8F for a description of directors' recommendations for changes, should the pilot be reinstated.

Table 8F
Pilot Center Directors' Recommendations for changes in the CWL structure

	% of centers
No changes necessary, keep it as it is	17%
Some changes necessary	83%
Suggestions for Changes:	
Provide wage increments beyond 5 years of service and/or include previous experience	21%*
Ensure continuation of whatever program is brought back	21%*
Increase administrative dollars, e.g., for benefits, scholarships, increased payroll taxes	17%*
Provide clearer guidelines, e.g., QCC, reporting, financial planning, employee information	17%*
Make wage steps larger for higher education levels, e.g., CDA and above	14%*
Bring DSHS reimbursement for subsidized children closer to tuition rates	10%*
Allow raises based on performance/ability	10%*
Make CWL available to a larger number of centers	7%*
Increase wages for all steps	7%*
Differentiate CWL rates based on regional differences (not only King County/State)	3%*
Include other staff positions in CWL, e.g., bus driver, cook	3%*

*More than 1 response possible

Directors' Reflections on their Center's Experiences with the CWL

During the telephone interviews, and in comments on the mail surveys, former pilot directors had much to say about how positive their experience with the CWL had been, and their sadness in seeing it end. They stated that they believed the CWL had helped them to improve the quality of the care they provided through being able to hire more qualified staff. They commented that their staff professionalism and morale had increased, as

demonstrated by staff pursuing education and staff stating they felt appreciated and valued (see Table 8G for a summary of director comments as they reflected on their center's experience with the CWL). Following is a quote from a former pilot center director which is representative of those made by many others:

"We would never have not wanted it, even though it was a shock and disappointment when it ended. It changed our whole center, helped us with accreditation and in getting skilled workers. Our staff greatly benefited from the emphasis on education, which is the key to quality. We were thrilled to be a part of it."

Anonymous Former Pilot Center Director, May 2004

Table 8G
Pilot Center Directors' Reflections on their Center's Participation in the CWL

	% of Centers
Highly positive experience, staff excited about the project and their jobs	72%
Money helped centers improve quality of care provided	34%
Early childhood field gained in professional reputation, staff felt appreciated/valued	24%
Able to hire better qualified staff (more educated and experienced)	17%
Staff were motivated to pursue their education	10%
Morale increased	10%
Program had clear guidelines once details worked out at start	10%

*More than 1 response possible

Summary

These results indicate that from the viewpoint of the respondents, staff in former pilot centers exhibited a significant decrease in morale after the end of the CWL; a change that was not visible in the comparison centers. Furthermore, directors directly attributed these changes in morale and professionalism, and its effects on overall center quality, to the ending of the CWL. In addition, the previous pattern of more positive changes in professionalism, skills, knowledge, and commitment to the field in pilot centers disappeared in the post CWL year to be replaced by comparison centers with higher scores on these scales.

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